



A

B

C

D

E

F

A

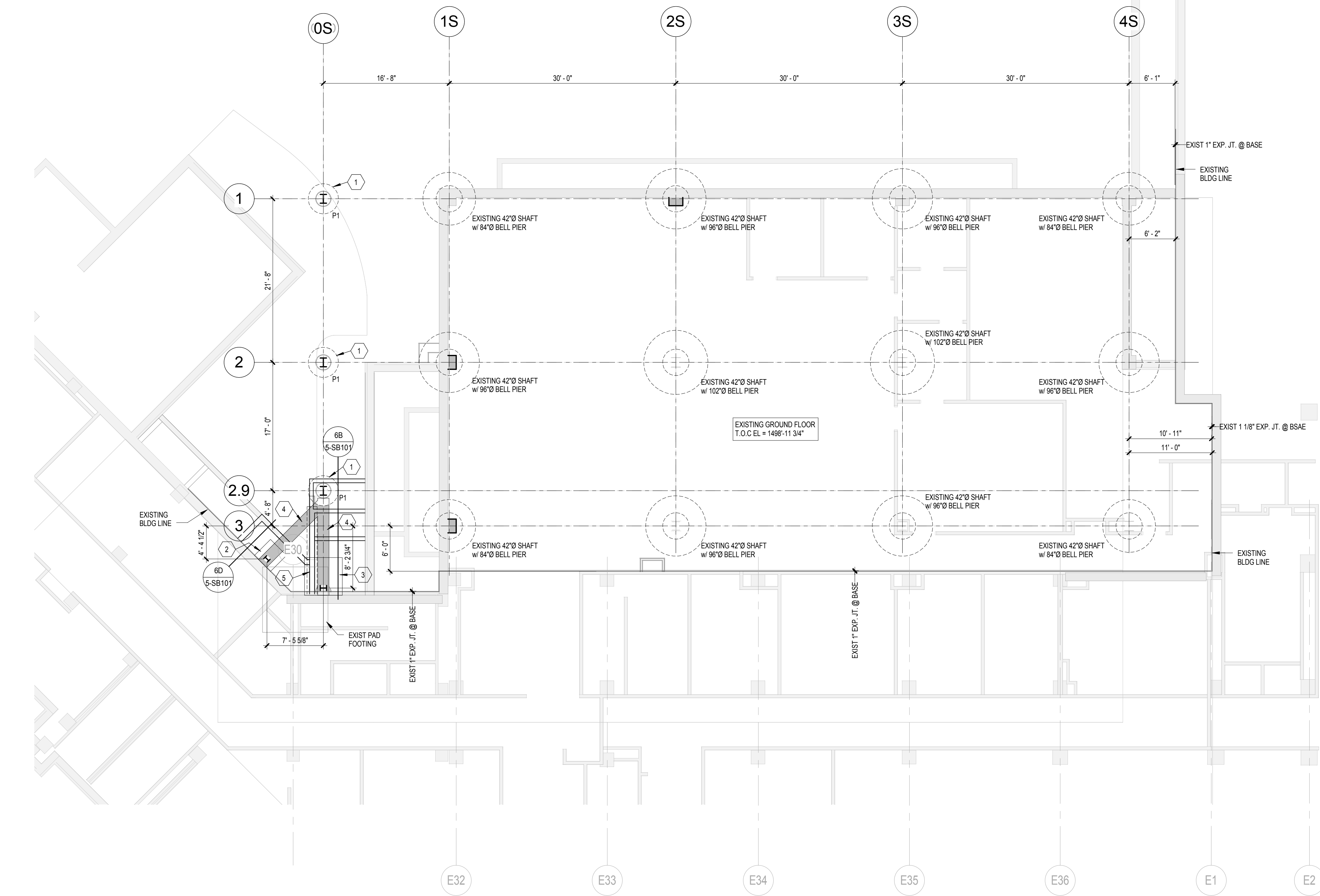
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C

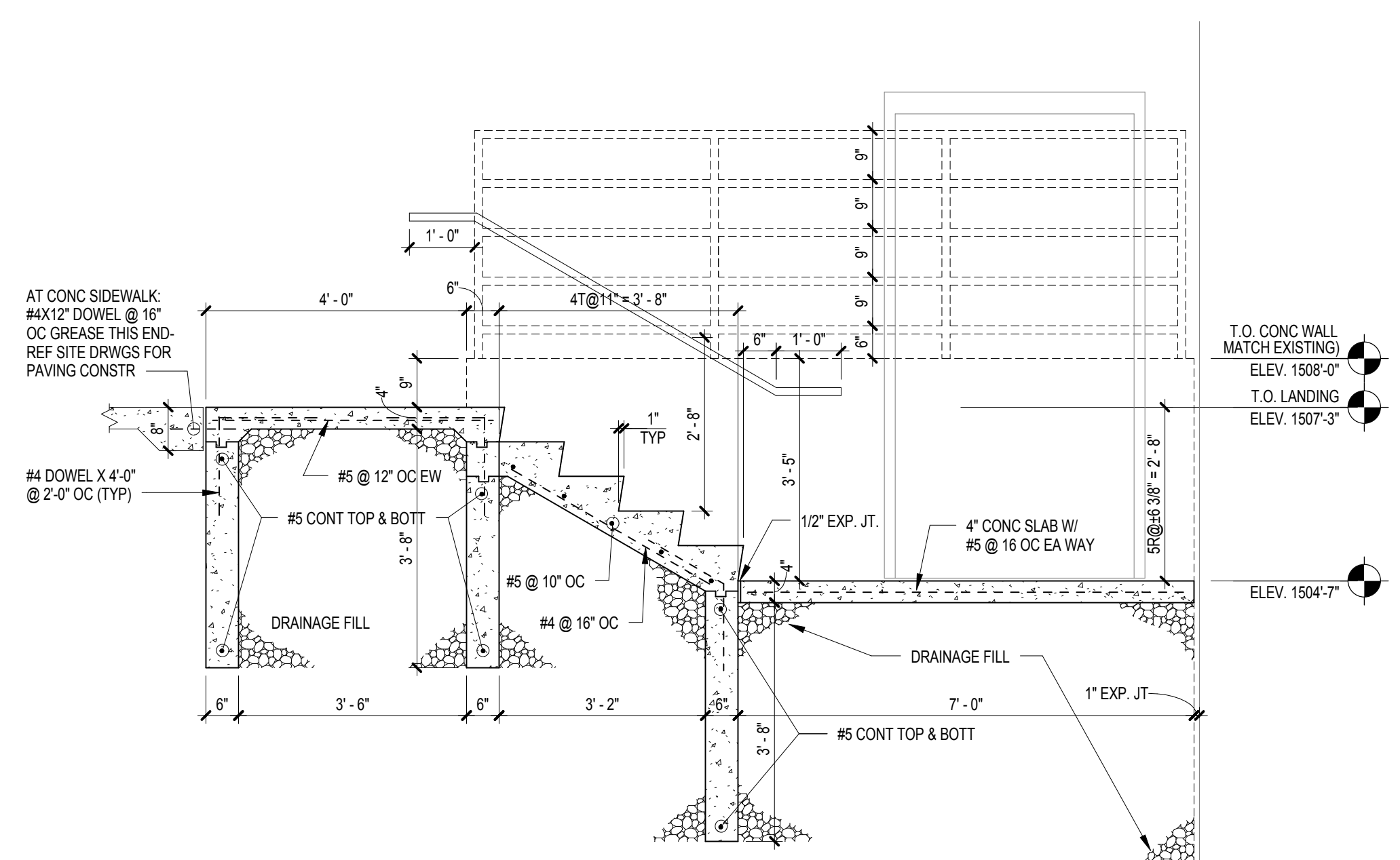
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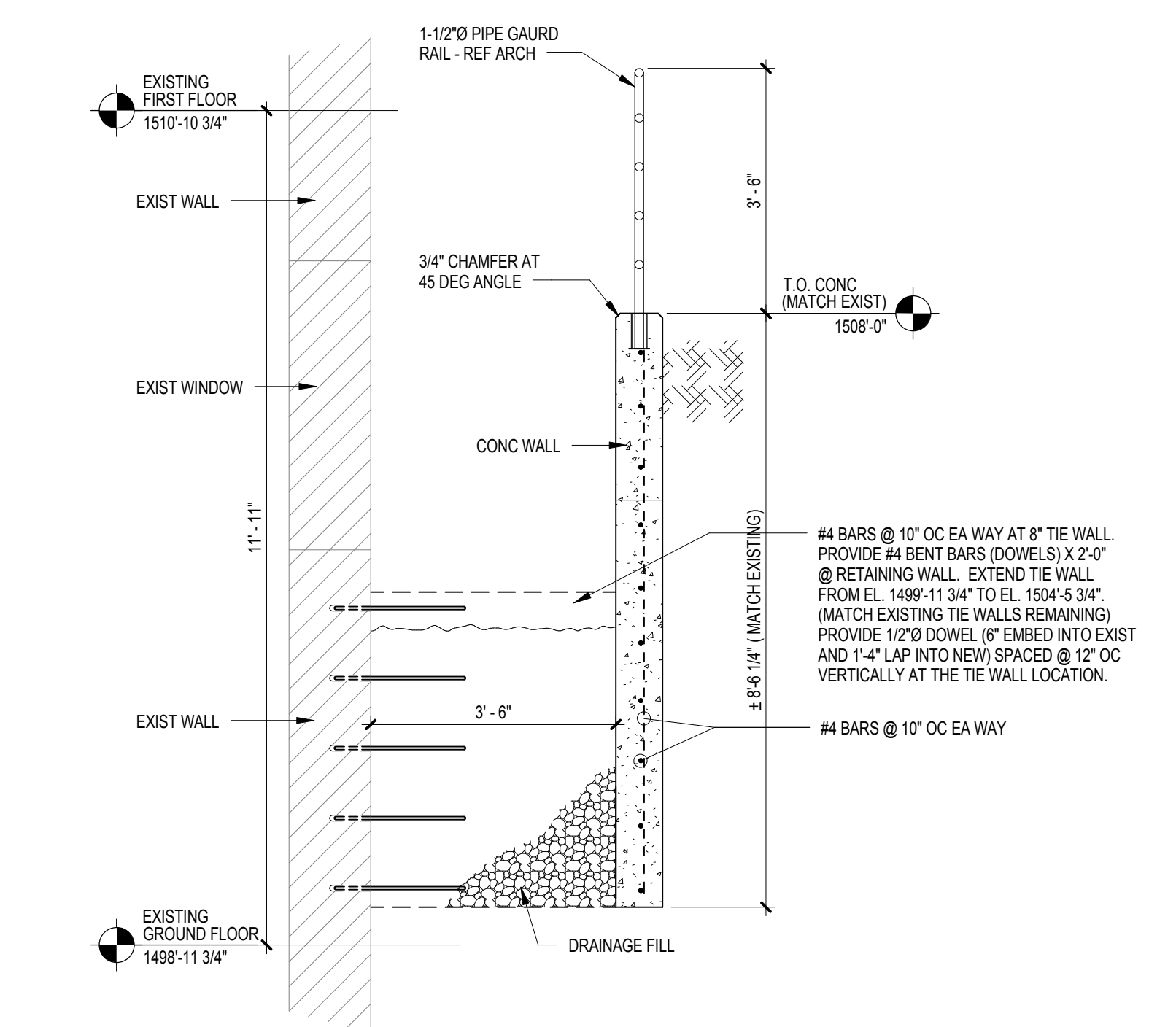
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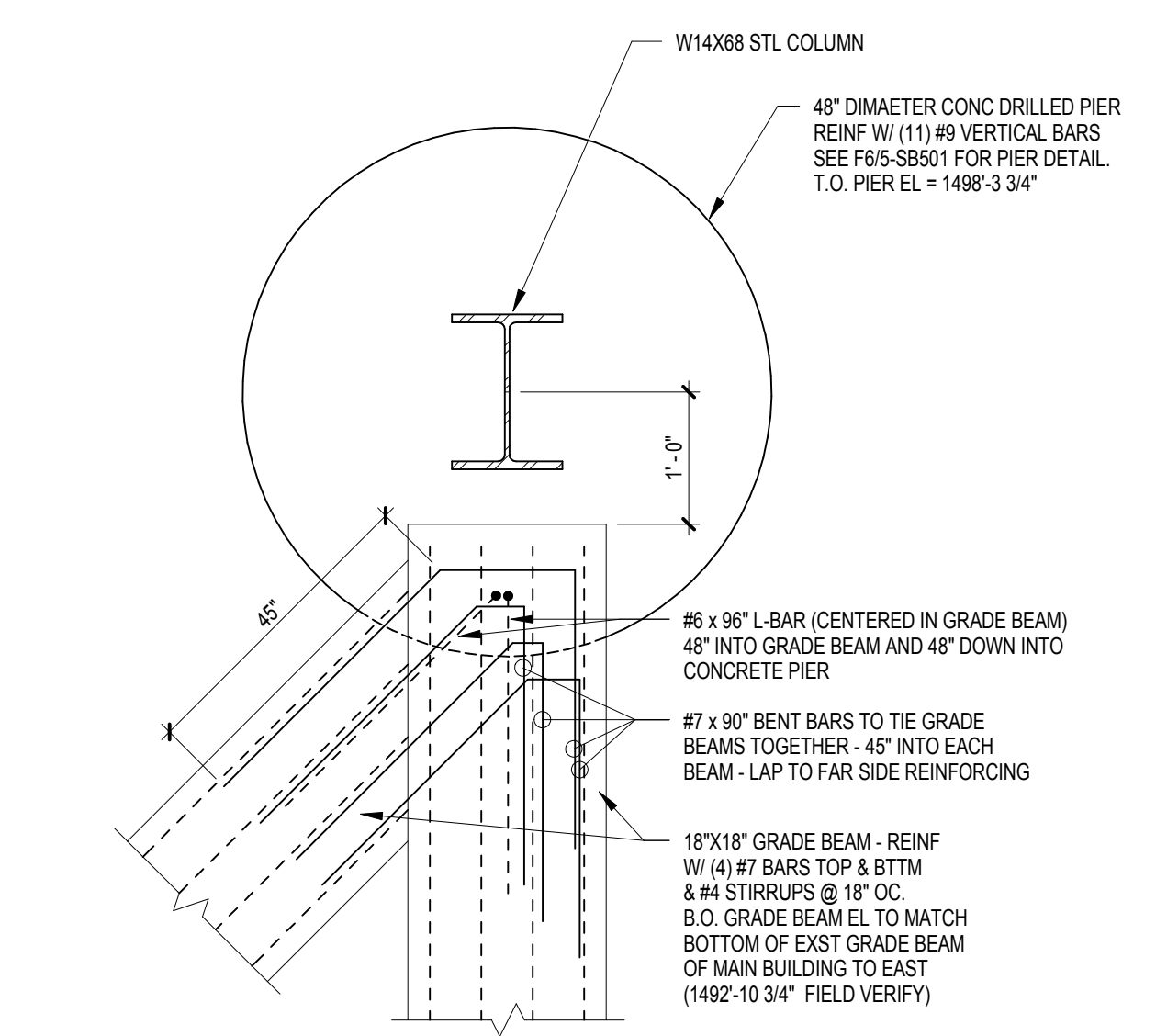
**1F FOUNDATION PLAN**  
1/8" = 1'-0"



**6B LANDING & STAIR SECTION**  
1/2" = 1'-0"



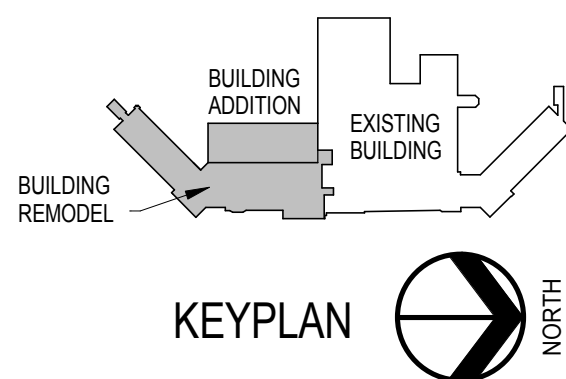
**6D WINDOW WELL SECTION**  
1/2" = 1'-0"



**6F GRADE BEAM DETAIL AT GRID OS, 2.9**  
3/4" = 1'-0"

- FOUNDATION PLAN GENERAL NOTES**
- A. REFERENCE SHEET 5-SB001 FOR EXISTING SOIL BORING AND BEARING CAPACITIES PER 1984 CONSTRUCTION DOCUMENTS.
  - B. MECHANICAL AND ELECTRICAL OPENINGS THRU GROUND FLOOR INTO CRAWLSPACE NEED TO BE CORE DRILLED AND LOCATED TO MISS EXISTING REINFORCEMENT IN CONCRETE FLOOR SYSTEM.
- REFERENCE COLUMN SCHEDULE ON 5-SF002.

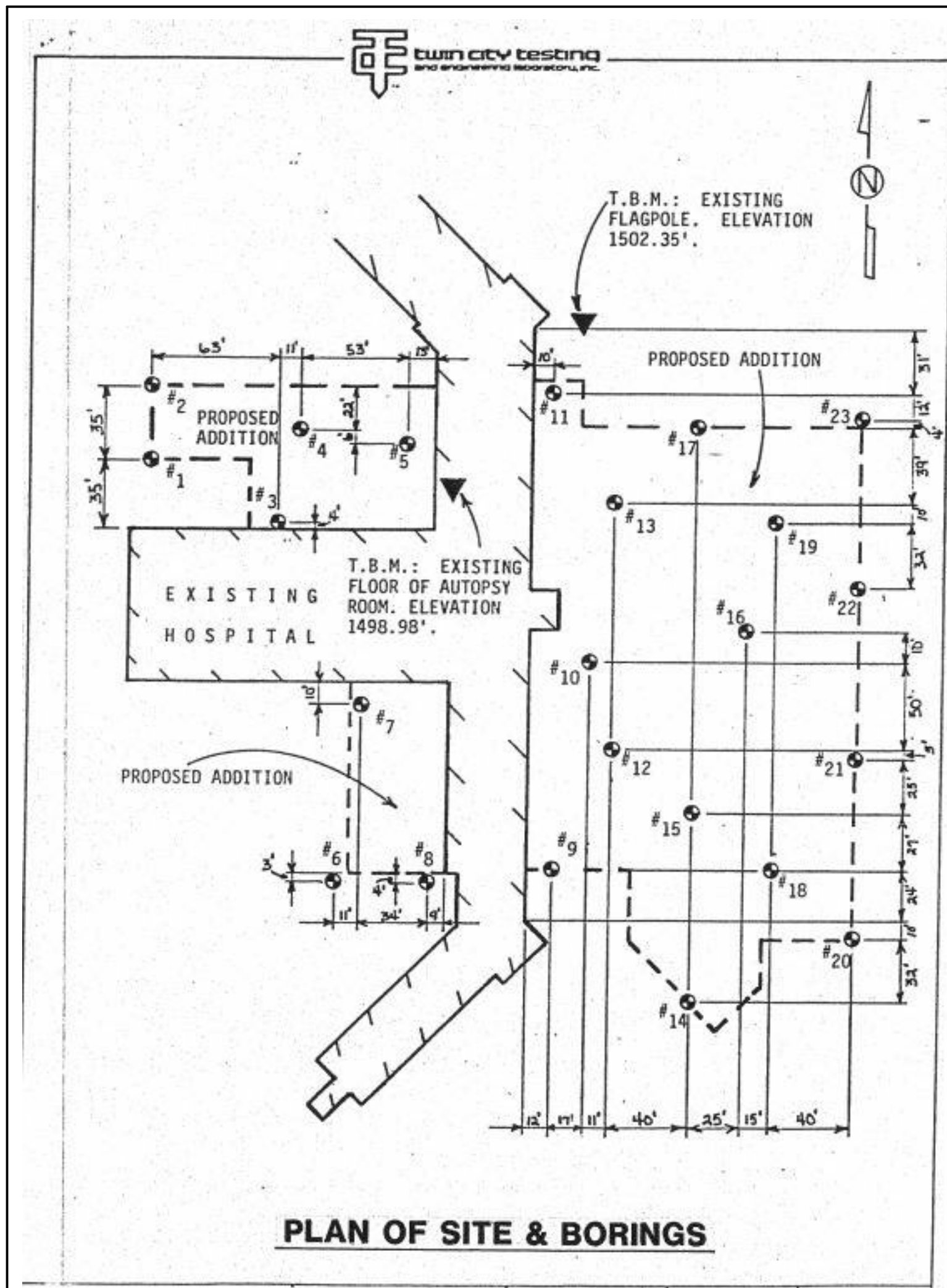
- FOUNDATION PLAN KEYNOTES**
- 1. 48" DIAMETER DRILLED PIER 30 FEET DEEP. REINFORCE W/ (11) #9 VERTICAL BARS. REF DET F10-SB001.
  - 2. 3'-0" X 3'-0" X 1'-0" PAD FOOTING - BOTTOM OF FOOTING TO MATCH BOTTOM OF EXISTING GRADE BEAM. REINFORCE WITH #4 #5 EA WAY. REF DET F10-SB001.
  - 3. 5'-0" X 5'-0" X 1'-3" PAD FOOTING - BOTTOM OF FOOTING TO MATCH BOTTOM OF EXISTING GRADE BEAM. REINFORCE WITH #4 #5 EA WAY. REF DET D715-SB001.
  - 4. 18"X18" GRADE BEAM - REINFORCE W/ (4) #7 TOP AND BOTTOM. REF DETAIL 875-SB101.
  - 5. FTG 1'-4" X 1'-3" W/ 2 #5 CONT BOTTL BELOW 8" CONC WALL ABOVE. T.O. FTG EL = 1498'-3 3/4" (WATCH EXISTING THAT IS BEING REPLACED).
- NOTE: NOT ALL KEYNOTES MAY BE USED ON EACH PLAN



**FULLY SPRINKLERED  
100% CONSTRUCTION DOCUMENTS**

<table><tr><td>MARK</td><td>REVISION DESCRIPTION</td><td>DATE</td></tr></table>	MARK	REVISION DESCRIPTION	DATE	<b>CONSULTANTS:</b>		<b>ARCHITECTS/ ENGINEERS:</b> <div>TSP, Inc. 1112 N. West Ave. Sioux Falls, SD 57104 phone: (605) 336-1160 fax: (605) 336-7926 www.teamtsp.com</div> <div> To Solve. To Excel. Together.</div>	<div>Drawing Title <b>FOUNDATION PLAN</b></div> <div>Approved: Project Director</div>	<div>Project Title <b>Sioux Falls VA Health Care System Acute Inpatient Medical Unit Addition and Renovation</b></div> <div>Location VA Medical Center 2501 W. 22nd Street, PO Box 5546 Sioux Falls, SD 57117-5546</div> <div><table><tr><td>Date 08/06/12</td><td>Checked MEL</td><td>Drawn TDB</td></tr></table></div>	Date 08/06/12	Checked MEL	Drawn TDB	<div>Project Number 04100857</div> <div>Building Number <b>5</b></div> <div><div><b>5-SB101</b> Dwg. 7 of 123</div></div>	<div> <b>Department of Veterans Affairs</b></div> <div><b>Office of Construction and Facilities Management</b></div>
	MARK	REVISION DESCRIPTION	DATE										
	Date 08/06/12	Checked MEL	Drawn TDB										





LOG OF TEST BORING										
JOB NO. 66-7584		VERTICAL SCALE: 1" = 5'				BORING NO. 6				
PROJECT PROPOSED VA HOSPITAL ADDITION/REMODELING - SIOUX FALLS, SD										
DEPTH IN FEET	DESCRIPTION OF MATERIAL	GEOLOGIC ORIGIN	N	WL	SAMPLE		LABORATORY TESTS			
					NO	TYPE	W	D	PL	QU
	FILL, mostly CLAY, brown and dark grayish brown	FILL			1	FA				
					2	FA				
5	SILTY CLAY, brown	LOESS			3	FA				
9	(CL-ML)									
	CLAYEY SILT, light gray and brown mottled, rather stiff		11		4	SB	15	94		
	(CL-ML)		13		5	SB				
			13		6	SB	19	104		
23	MEDIUM FAT CLAY, a little gravel, brown mottled, stiff to very stiff	TILL	22		7	SB	20	109		5500
	(CL-CH)		23		8	SB				
30	CONTINUED ON NEXT PAGE									



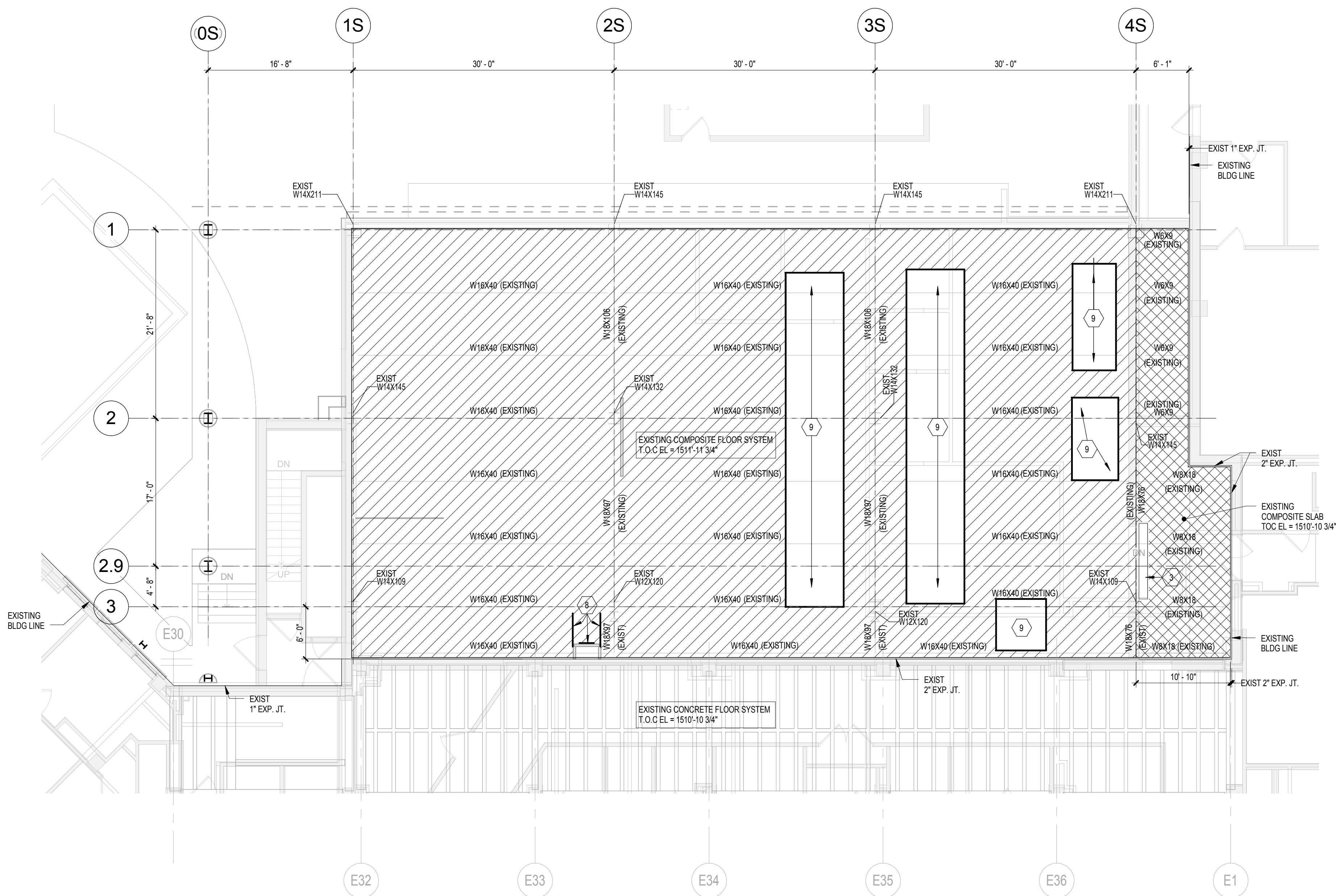
FRAMING GENERAL NOTES

- A. PROVIDE FLOOR DRAINS AS SHOWN IN ARCH & MECH DRAWINGS. REFERENCE ARCH AND MECH FOR DRAIN QUANTITIES, LOCATIONS AND FLOOR SLOPE.
- B. INSTALL DECK SUPPORT FRAMING AROUND ALL PENETRATIONS THROUGH STEEL FORM DECK AND STEEL ROOF DECK INCLUDING MECHANICAL OPENINGS AND ROOF DRAINS. CONTRACTOR TO VERIFY AND COORDINATE LOCATIONS AND QUANTITIES. REFERENCE DETAIL 2E/5-SF501.
- C. TOP OF STEEL BEAM ELEVATION TO BE LOCATED 6-1/2" BELOW TOP OF SLAB ELEVATION, UNO.
- D. HATCHED AREA REPRESENTS EXISTING FLOOR SYSTEM TO REMAIN.
- E. REFERENCE COLUMN SCHEDULE ON 5-SF502.
- F. REFERENCE SHEET 5-SF502 FOR EXTERIOR NON-BEARING BRICK ANGLE SCHEDULE.
- G. STEEL CONNECTIONS TO BE DESIGNED FOR REACTIONS SHOWN ON PLANS WITH A MINIMUM 5 KIPS REACTION, UNO.

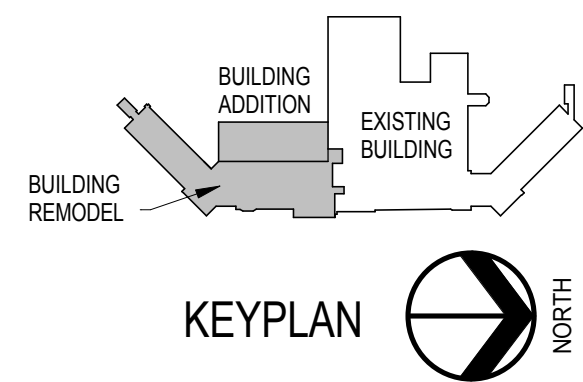
FRAMING PLAN KEYNOTES

- 1 REMOVE CMU BELOW BEAM TO ACCOMMODATE OPENING PER ARCHITECTURAL DRAWINGS.
- 2 PROVIDE A 1/8"x7/16" CLIP AT THIS LOCATION. WELD 5" LEG TO BOTTOM OF BOTTOM FLANGE OF STL BEAM ABOVE. REF DET 605-SF501
- 3 PROVIDE CAST-IN-PLACE CONCRETE STAIR. REFERENCE DETAIL 501S-SF501
- 4 OPENING IN STRUCTURAL BEAM AT THIS LOCATION. REFERENCE DETAIL 1C/5-SF501 FOR REINFORCING AND OPENING REQUIREMENTS. REF ARCH AND MECH FOR ADDITIONAL INFORMATION.
- 5 HSS4X4X3/16 W/ 1/2" TOP PLATE AND 5'X10'X1" BASE PLATE W/ 3/4" DRILL AND EPOXY ANCHORS (4" MIN EMBED) INTO EXISTING FLOOR. PROVIDE NON-SHRINK GROUT UNDER BASE PLATE. POSITION HSS 4X4 AS CLOSE TO EXIST CONCRETE COLUMN - DRILL THRU STL COLUMN INTO EXISTING CONC COL AND DRILL AND EPOXY 3/4" DIAMETER BOLT W/ HILTI HY150 MAX AT 8TMM, HALF HEIGHT AND TOP. REF DETAIL 2B/5-SF501.
- 6 W8X20 STL BEAM TO SUPPORT PATIENT LIFTS IN EACH NEW PATIENT ROOM - ATTACH TO STL BEAMS. REF DETAIL 4B/5-SF501 FOR SUPPORT CONNECTIONS. COORDINATE WITH ARCHITECTURAL FOR EXACT LOCATION AND FURTHER INFORMATION.
- 7 PARAPET FRAMING: HSS4X2X1/8 COLUMN @ 4'-0" OC W/ #4 (A706) X 2'-0" DOWELS EA SIDE IN COMPOSITE SLAB. INFILL BETWEEN COLUMNS WITH 6" METAL STUDS. WELD STM OF HSS4X2 TO TOP OF BEAM W/ 1/8" FILLET WELD EACH 4" PER SIDE. REF DETAIL 1B/5-SF501
- 8 PROVIDE WELDED ANGLE FRAME AT THIS LOCATION PER DETAIL 2E/5-SF501 TO ACCOMMODATE OPENING IN FLOOR SYSTEM.
- 9 4" CONCRETE MECHANICAL PAD AT THIS LOCATION. COORDINATE EXACT LOCATION AND SIZE WITH MECHANICAL CONTRACTOR. REFERENCE DETAIL 2F/5-SF501
- 10 NEW MECH LOUVER AT THIS LOCATION. EXISTING STRUCTURE TO BE VERIFIED - CONTACT ENGINEER ON RECORD TO VERIFY UNTEL REQUIRED ABOVE OPENING. COORD EXACT SIZE AND LOCATION W/ MECH DRAWINGS.
- 11 W8X20 STL BEAM TO SUPPORT PATIENT LIFTS IN EACH EXISTING PATIENT ROOM - ATTACH TO EXISTING PAN AND JOIST FLOOR SYSTEM. REF DETAIL 7B/5-SF502 FOR SUPPORT CONNECTIONS. COORDINATE WITH ARCHITECTURAL FOR EXACT LOCATION AND FURTHER INFORMATION.
- 12 ALTERNATE #4 - IF PROCEDURE ROOM (310) ALTERNATE IS ACCEPTED, AFTER VERIFICATION OF EXISTING STRUCTURE, PLEASE PROVIDE LIGHTING STRUCTURE PER DETAIL 4B/5-SF502.
- 13 NEW DOOR TO BE PLACED IN EXISTING WINDOW OPENING ON 4TH LEVEL. VERIFY EXISTING STRUCTURE AND WINDOW OPENING ON RECORD TO VERIFY EXISTING UNTEL IN PLACE. COORDINATE WITH ARCHITECTURAL DRAWINGS.
- 14 HSS8X5X3/8" STL COLUMN W/ 1/2" TOP PLATE AND 6'X12'X3/4" BASE PLATE. PROVIDE NON-SHRINK GROUT UNDER BASE PLATE. CONNECT TO STRUCTURE ABOVE AND BELOW AS SHOWN IN DETAIL 1F/5-SF502.
- 15 W8 BEAM LOCATED TO ACCOMMODATE PLUMBING IN WALL BELOW. COORD. LOCATION W/ MECH CONTRACTOR AND ARCH. NOTIFY EOR IF SLAB EDGE DIMENSION IS GREATER THAN SHOWN TO VERIFY SLAB EDGE SUPPORT.
- 16 MECH ROOF TOP EQUIPMENT ABOVE AT THIS LOCATION. COORDINATE W/ MECH DRAWINGS AND CONTRACTOR.
- 17 PROVIDE A 1/2" SINGLE ANGLE AT EACH END OF W8 BEAM TO EXISTING CONC BEAM. WELD ANGLE TO W8 BEAM WEB AND CONNECT TO EXIST CONC BEAM W/ (2) 3/4" DRILL AND EPOXY ANCHORS (HILTI HY150 MAX) W/ 5" EMBED




NOTE: NOT ALL KEYNOTES MAY BE USED ON EACH PLAN



1F FIRST LEVEL FRAMING PLAN  
1/8" = 1'-0"



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	MARK	REVISION DESCRIPTION	DATE								
				Building Number 5							
			Approved: Project Director	Location VA Medical Center 2501 W. 22nd Street, PO Box 5046 Sioux Falls, SD 57117-5046		Drawing Number 5-SF101 Dwg. 9 of 123					
		Date 08/06/12	Checked MEL	Drawn TDB							



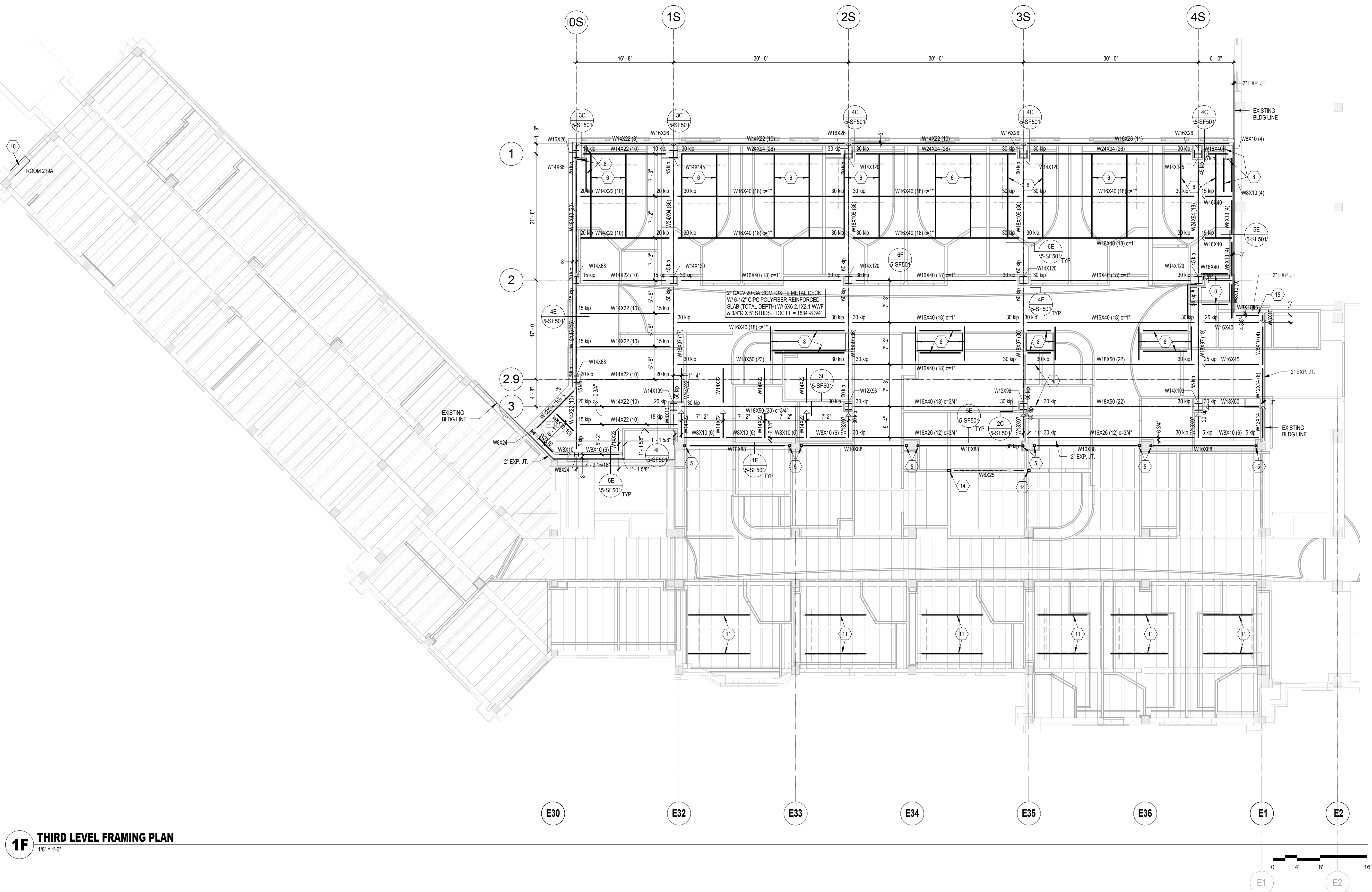
# FRAMING GENERAL NOTES

- PROVIDE FLOOR DRAINS AS SHOWN IN ARCH & MECH DRAWINGS. REFERENCE ARCH AND MECH FOR DRAIN QUANTITIES, LOCATIONS AND FLOOR SLOPE.
- INSTALL DECK SUPPORT FRAMING AROUND ALL PENETRATIONS THROUGH STEEL FORM DECK AND STEEL ROOF DECK INCLUDING MECHANICAL OPENINGS AND ROOF DRAINS. CONTRACTOR TO VERIFY AND COORDINATE LOCATIONS AND QUANTITIES. REFERENCE DETAIL 2E5-SF501.
- TOP OF STEEL BEAM ELEVATION TO BE LOCATED 6-1/2" BELOW TOP OF SLAB ELEVATION. UNO.
- HATCHED AREA REPRESENTS EXISTING FLOOR SYSTEM TO REMAIN.
- REFERENCE COLUMN SCHEDULE ON 5-SF502.
- REFERENCE SHEET 5-SF502 FOR EXTERIOR NON-BEARING BRICK ANGLE SCHEDULE.
- STEEL CONNECTIONS TO BE DESIGNED FOR REACTIONS SHOWN ON PLANS WITH A MINIMUM 5 KIPS REACTION. UNO.

# FRAMING PLAN KEYNOTES

- REMOVE CMU BELOW BEAM TO ACCOMMODATE OPENING PER ARCHITECTURAL DRAWINGS.
- PROVIDE A 1/8"x7/16" CLIP AT THIS LOCATION. WELD 8" LEG TO BOTTOM OF BOTTOM FLANGE OF STL BEAM ABOVE. REF DET 6D5-SF501
- PROVIDE CAST-IN-PLACE CONCRETE STAIR. REFERENCE DETAIL 5C15-SF501
- OPENING IN STRUCTURAL BEAM AT THIS LOCATION. REFERENCE DETAIL 1C5-SF501 FOR REINFORCING AND OPENING REQUIREMENTS. REF ARCH AND MECH FOR ADDITIONAL INFORMATION.
- HSS4X4X3/16 W/ 1/2" TOP PLATE AND 5'X10'X1" BASE PLATE W/ 2-3/4" DRILL AND EPOXY ANCHORS (4" MIN EMBED) INTO EXISTING FLOOR. PROVIDE NON-SHRINK GROUT UNDER BASE PLATE. POSITION HSS 4X4 AS CLOSE TO EXIST CONCRETE COLUMN - DRILL THRU STL COLUMN INTO EXISTING CONC COL AND DRILL AND EPOXY 3/4" DIAMETER BOLT W/ HLT HY150 MAX AT BTM. HLT HEIGHT AND TOP. REF DETAIL 2B5-SF501.
- WBX20 STL BEAM TO SUPPORT PATIENT LIFTS IN EACH NEW PATIENT ROOM - ATTACH TO STL BEAMS. REF DETAIL 4B5-SF501 FOR SUPPORT CONNECTIONS. COORDINATE WITH ARCHITECTURAL FOR EXACT LOCATION AND FURTHER INFORMATION.
- PARAPET FRAMING: HSS4X2X1/8 COLUMN @ 4'-0" OC W/ #4 (A706) X 2'-0" DOWELS EA SIDE IN COMPOSITE SLAB. INFILL BETWEEN COLUMNS WITH 6" METAL STUDS. WELD STM OF HSS4 TO TOP OF BEAM W/ 1/8" FILLET WELD EACH 4" PER SIDE. REF DETAIL 1B5-SF501
- PROVIDE WELDED ANGLE FRAME AT THIS LOCATION PER DETAIL 2E5-SF501 TO ACCOMMODATE OPENING IN FLOOR SYSTEM.
- 4" CONCRETE MECHANICAL PAD AT THIS LOCATION. COORDINATE EXACT LOCATION AND SIZE WITH MECHANICAL CONTRACTOR. REFERENCE DETAIL 2F5-SF501
- NEW MECH LOUVER AT THIS LOCATION. EXISTING STRUCTURE TO BE VERIFIED - CONTACT ENGINEER ON RECORD TO VERIFY UNTEL REQUIRED ABOVE OPENING. COORD EXACT SIZE AND LOCATION W/ MECH DRAWINGS.
- WBX20 STL BEAM TO SUPPORT PATIENT LIFTS IN EACH EXISTING PATIENT ROOM - ATTACH TO EXISTING PAN AND JOIST FLOOR SYSTEM. REF DETAIL 7B5-SF502 FOR SUPPORT CONNECTIONS. COORDINATE WITH ARCHITECTURAL FOR EXACT LOCATION AND FURTHER INFORMATION.
- ALTERNATE #4 - IF PROCEDURE ROOM (310) ALTERNATE IS ACCEPTED, AFTER VERIFICATION OF EXISTING STRUCTURE. PLEASE PROVIDE LIGHTING STRUCTURE PER DETAIL 4B5-SF502.
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- HSS8X5X3/8" STL COLUMN W/ 1/2" TOP PLATE AND 6'X12'X3/4" BASE PLATE. PROVIDE NON-SHRINK GROUT UNDER BASE PLATE. CONNECT TO STRUCTURE ABOVE AND BELOW AS SHOWN IN DETAIL 1F5-SF502.
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- MECH ROOF TOP EQUIPMENT ABOVE AT THIS LOCATION. COORDINATE W/ MECH DRAWINGS AND CONTRACTOR.
- PROVIDE A 1/2" SINGLE ANGLE AT EACH END OF W8 BEAM TO EXISTING CONC BEAM. WELD ANGLE TO W8 BEAM WEB AND CONNECT TO EXIST CONC BEAM W/ (2) 3/4" DRILL AND EPOXY ANCHORS (HLT HY150 MAX) W/ 5" EMBED

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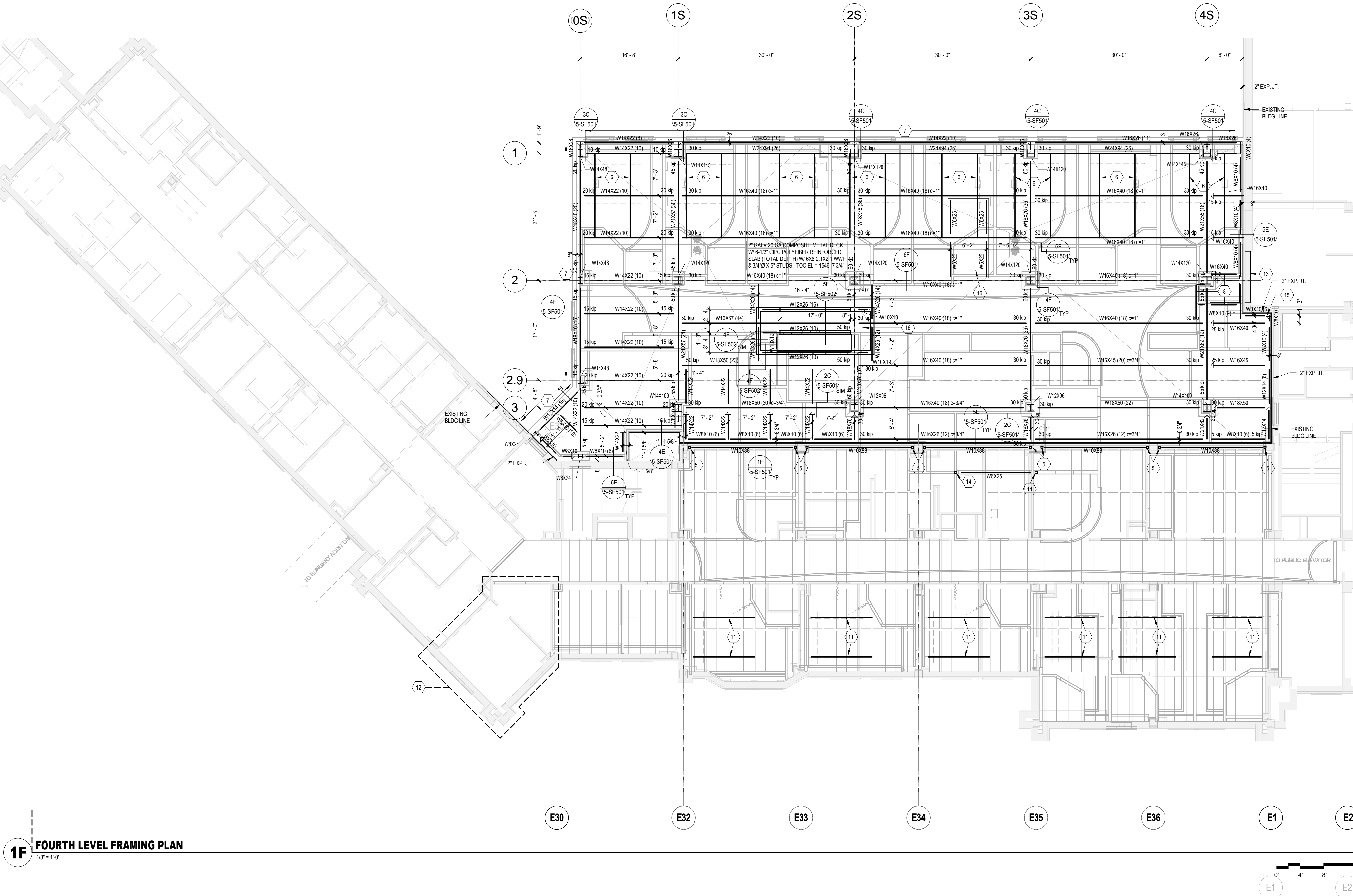
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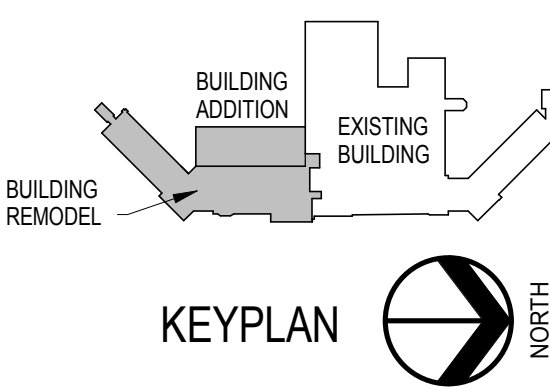
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6. W8X20 STL BEAM TO SUPPORT PATIENT LIFTS IN EACH NEW PATIENT ROOM - ATTACH TO STL BEAMS. REF DETAIL 4B5-SF501 FOR SUPPORT CONNECTIONS. COORDINATE WITH ARCHITECTURAL FOR EXACT LOCATION AND FURTHER INFORMATION.
7. PARAPET FRAMING: HSS4X2X1/8 COLUMN @ 4'-0" OC W/ #4 (A706) X 2'-0" DOWELS EA SIDE IN COMPOSITE SLAB. INFILL BETWEEN COLUMNS WITH 6" METAL STUDS. WELD BTM OF HSS4X2 TO TOP OF BEAM W/ 1/8" FILLET WELD EACH 4" PER SIDE. REF DETAIL 1B5-SF501
8. PROVIDE WELDED ANGLE FRAME AT THIS LOCATION PER DETAIL 2E5-SF501 TO ACCOMMODATE OPENING IN FLOOR SYSTEM.
9. 4" CONCRETE MECHANICAL PAD AT THIS LOCATION. COORDINATE EXACT LOCATION AND SIZE WITH MECHANICAL CONTRACTOR. REFERENCE DETAIL 2F5-SF501
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17. PROVIDE A 1/2" SINGLE ANGLE AT EACH END OF W8 BEAM TO EXISTING CONC BEAM. WELD ANGLE TO W8 BEAM WEB AND CONNECT TO EXIST CONC BEAM W/ (2) 3/4" DRILL AND EPOXY ANCHORS (HILTI HY150 MAX) W/ 5" EMBED




NOTE: NOT ALL KEYNOTES MAY BE USED ON EACH PLAN

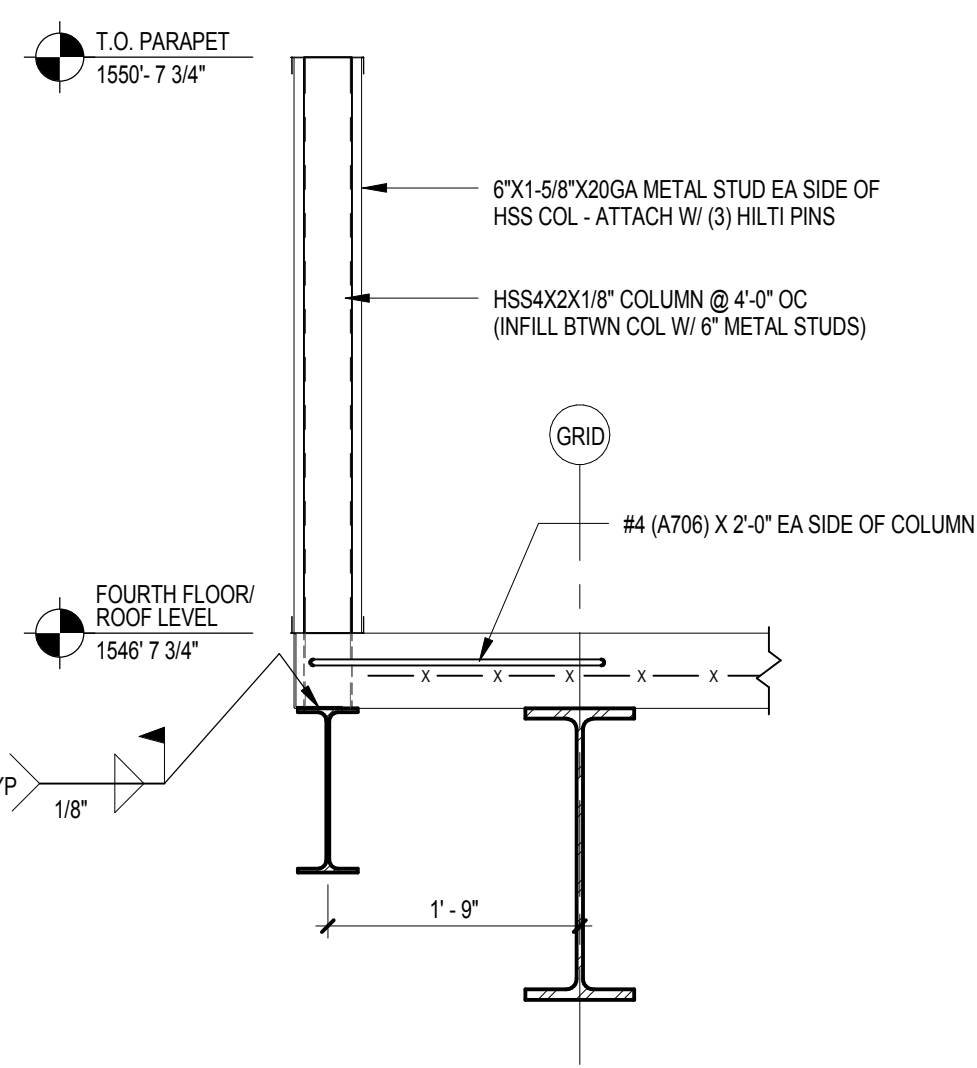


1F FOURTH LEVEL FRAMING PLAN  
1/8" = 1'-0"

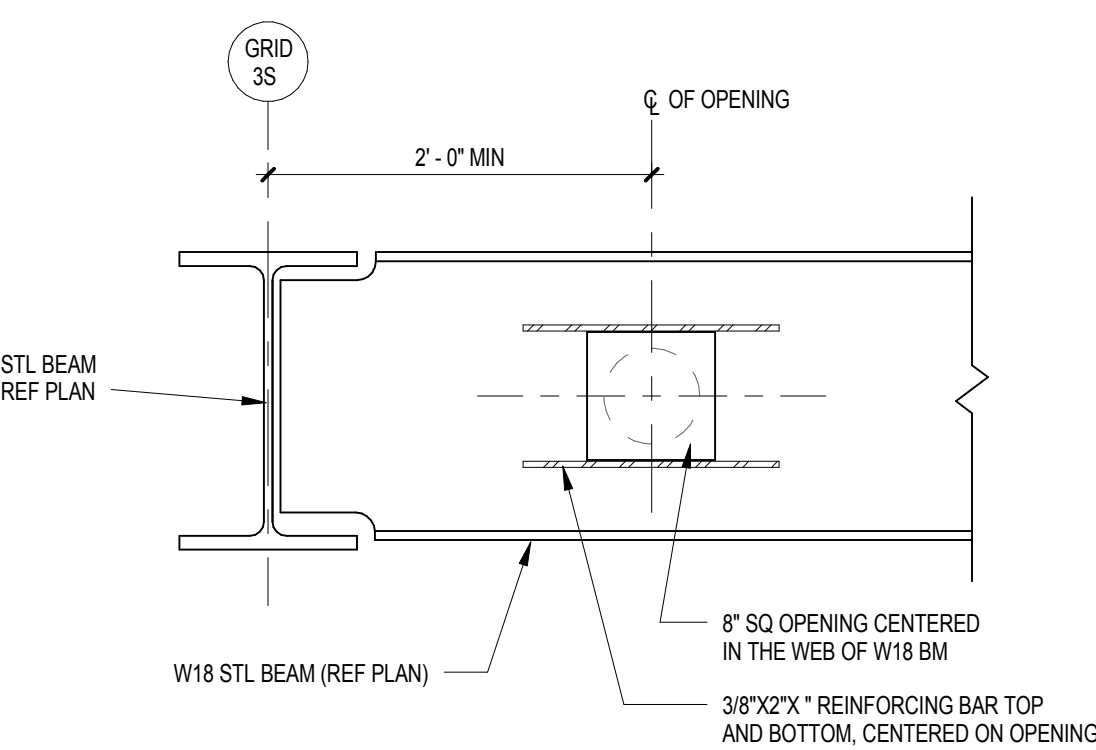


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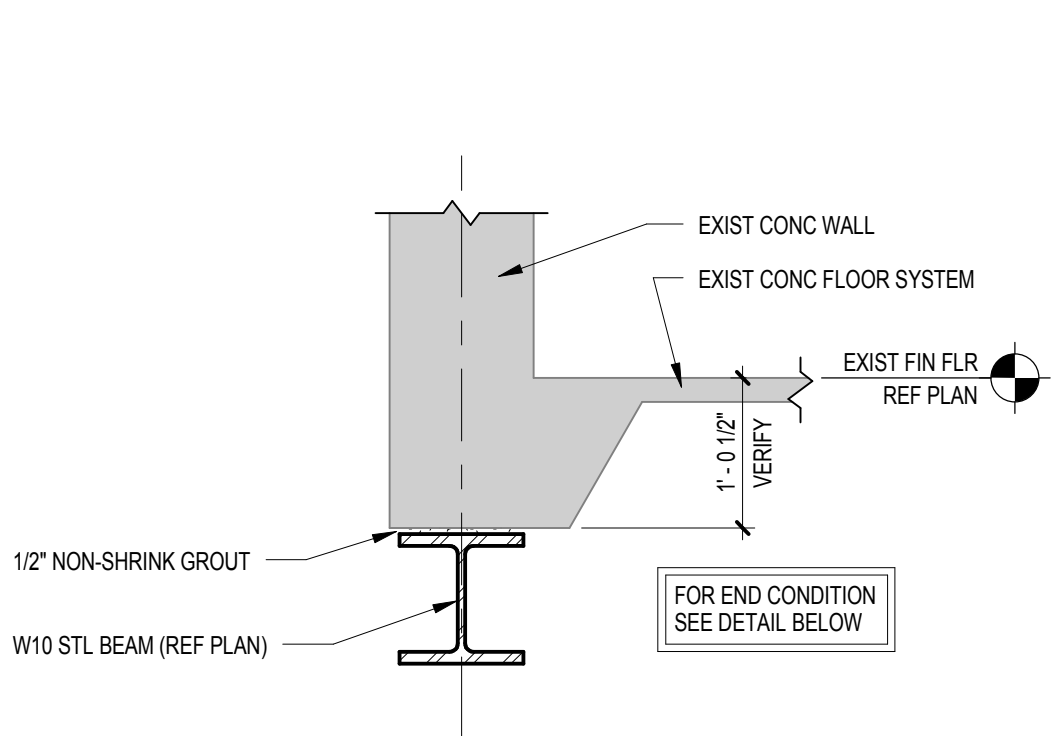
MARK	REVISION DESCRIPTION	DATE	CONSULTANTS:		ARCHITECTS/ ENGINEERS:  TSP, Inc. 1112 N. West Ave. Sioux Falls, SD 57104 phone: (605) 336-1160 fax: (605) 336-7926 www.teamtsp.com  To Solve. To Excel. Together.	Drawing Title <b>FOURTH LEVEL FLOOR FRAMING PLAN</b>	Approved: Project Director	Project Title <b>Sioux Falls VA Health Care System Acute Inpatient Medical Unit Addition and Renovation</b>	Location VA Medical Center 2891 W. 22nd Street, PO Box 5046 Sioux Falls, SD 57117-5046	Project Number 04100857 Building Number <b>5</b>	Drawing Number <b>5-SF104</b> Dwg. 12 of 123	Office of Construction and Facilities Management 
Date	08/06/12	Checked	MEL	Drawn	TDB							



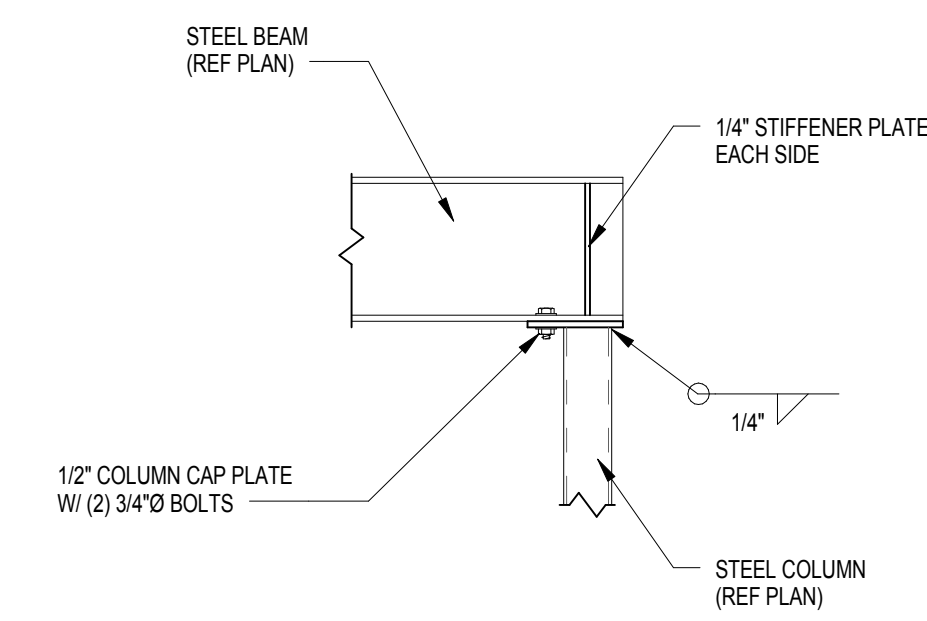
**1B PARAPET DETAIL**  
3/4" = 1'-0"



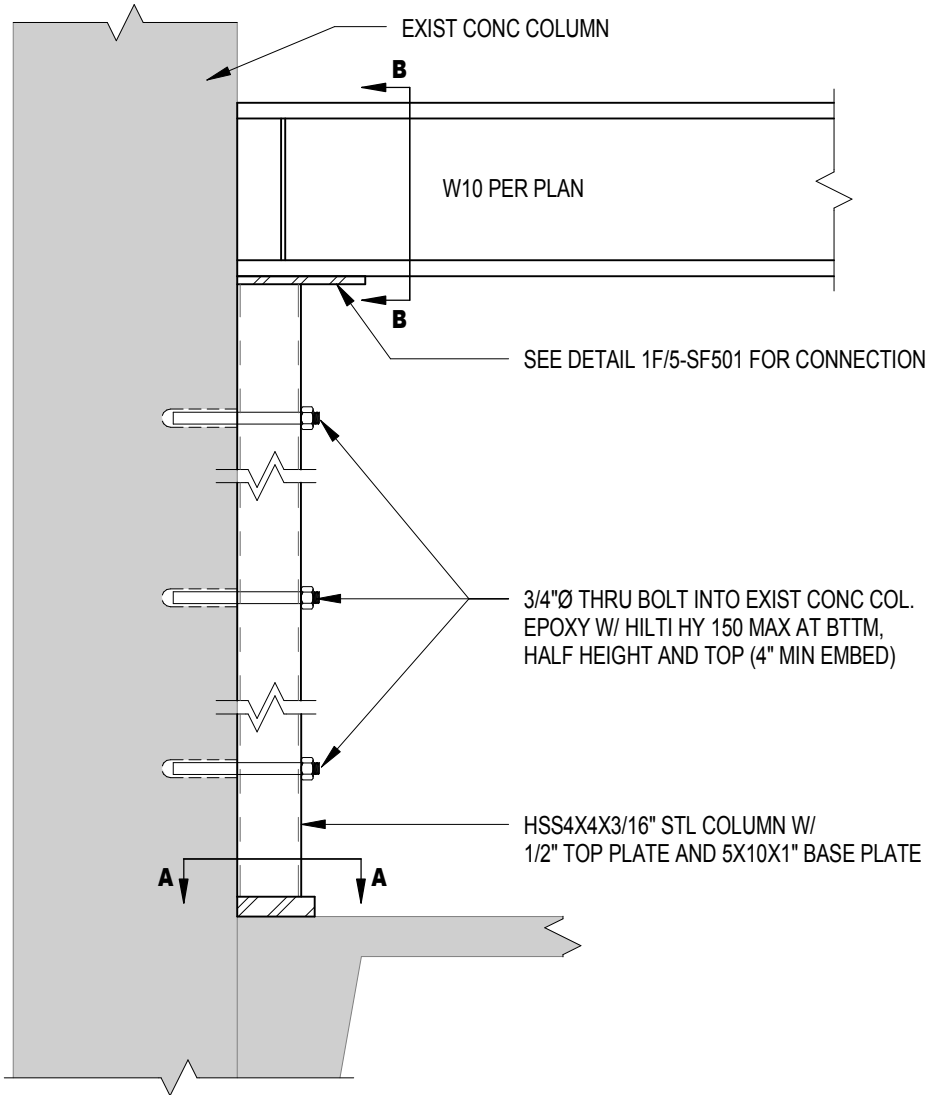
**1C OPENING IN STL BEAM**  
1" = 1'-0"



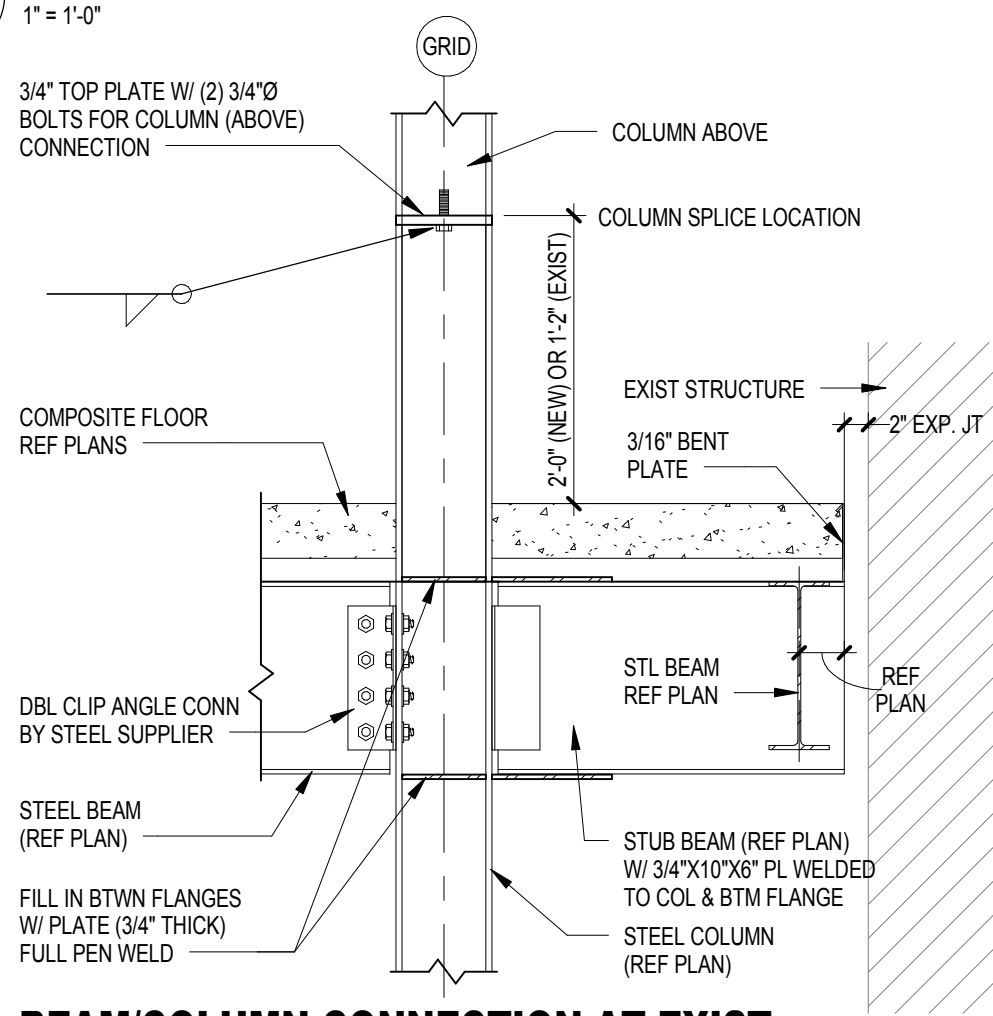
**1E BEAM DETAIL @ OPENINGS IN EXISTING**  
3/4" = 1'-0"



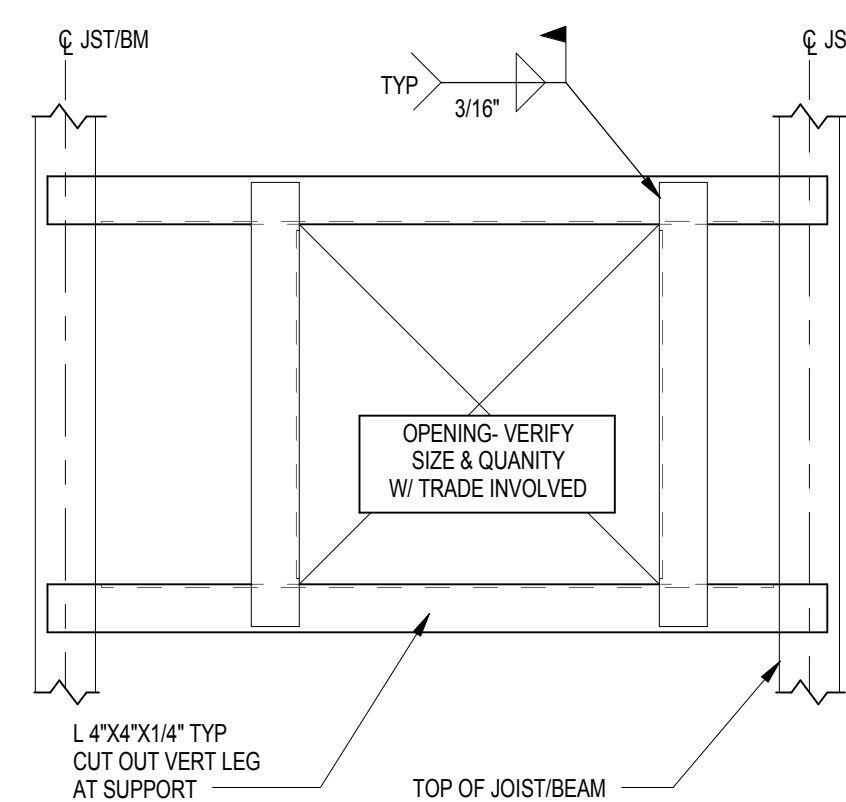
**1F TYP BEAM/COLUMN CONNECTION**  
3/4" = 1'-0"



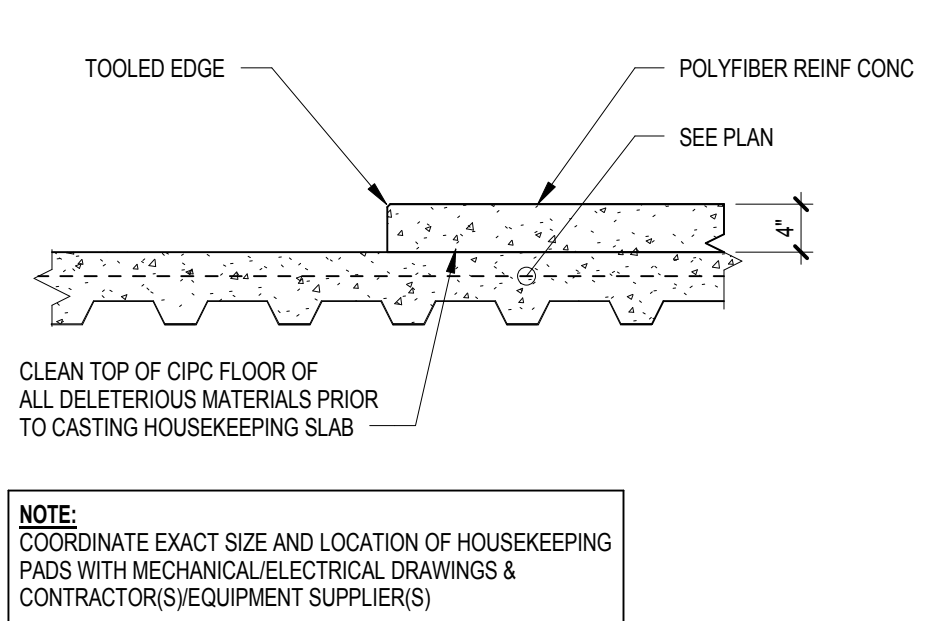
**2B BEAM DETAIL @ OPENING IN EXISTING END CONDITION**  
1" = 1'-0"



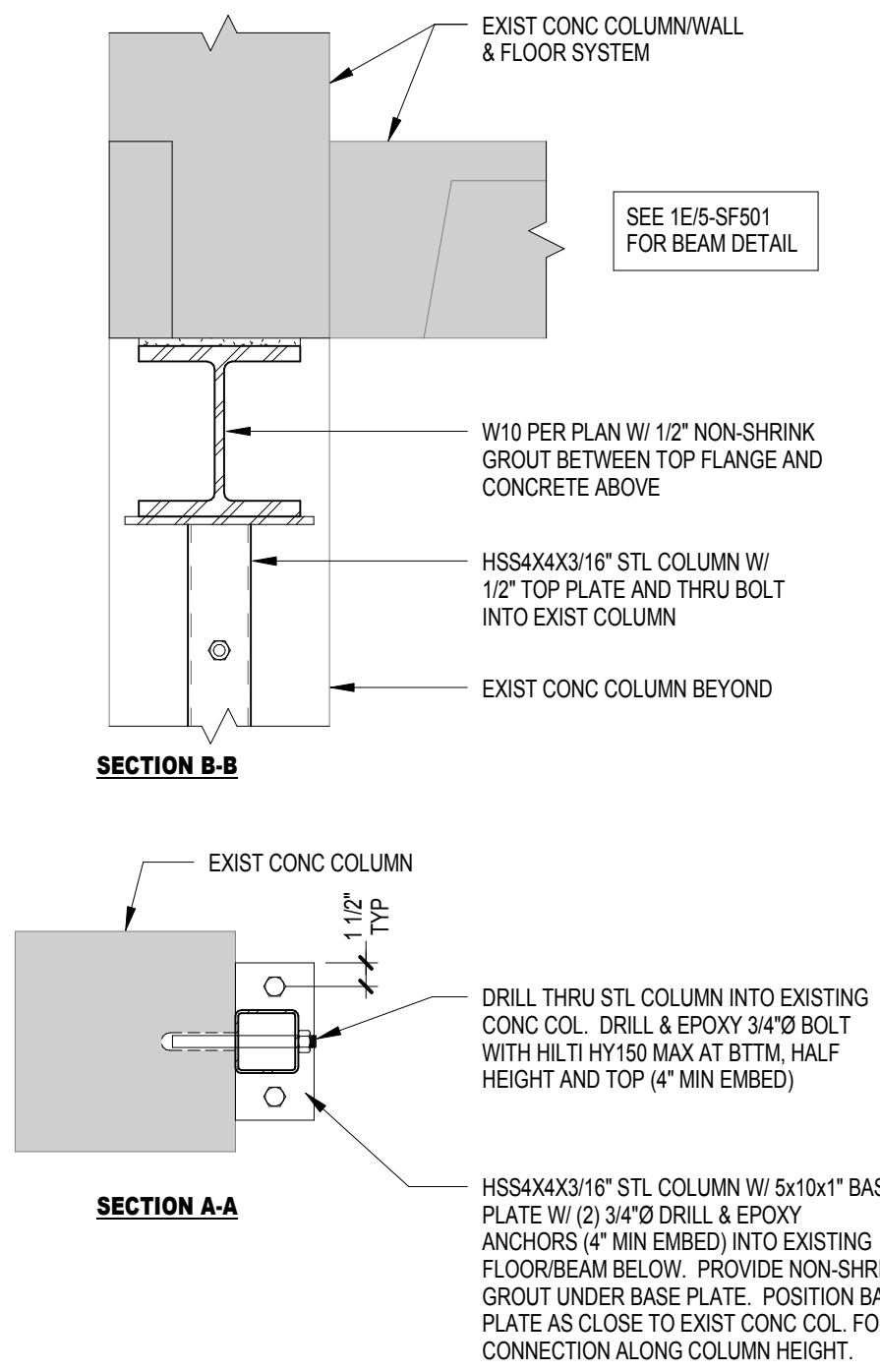
**2C BEAM/COLUMN CONNECTION AT EXIST**  
3/4" = 1'-0"



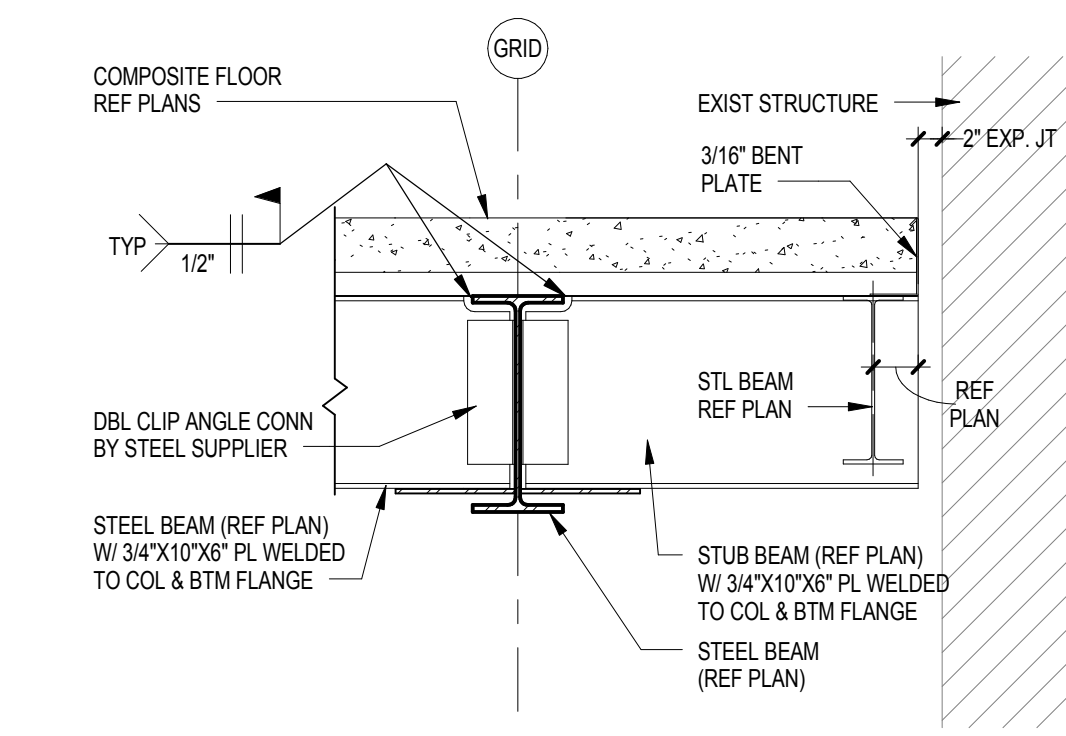
**2E ROOF OPENING DETAIL**  
3/4" = 1'-0"



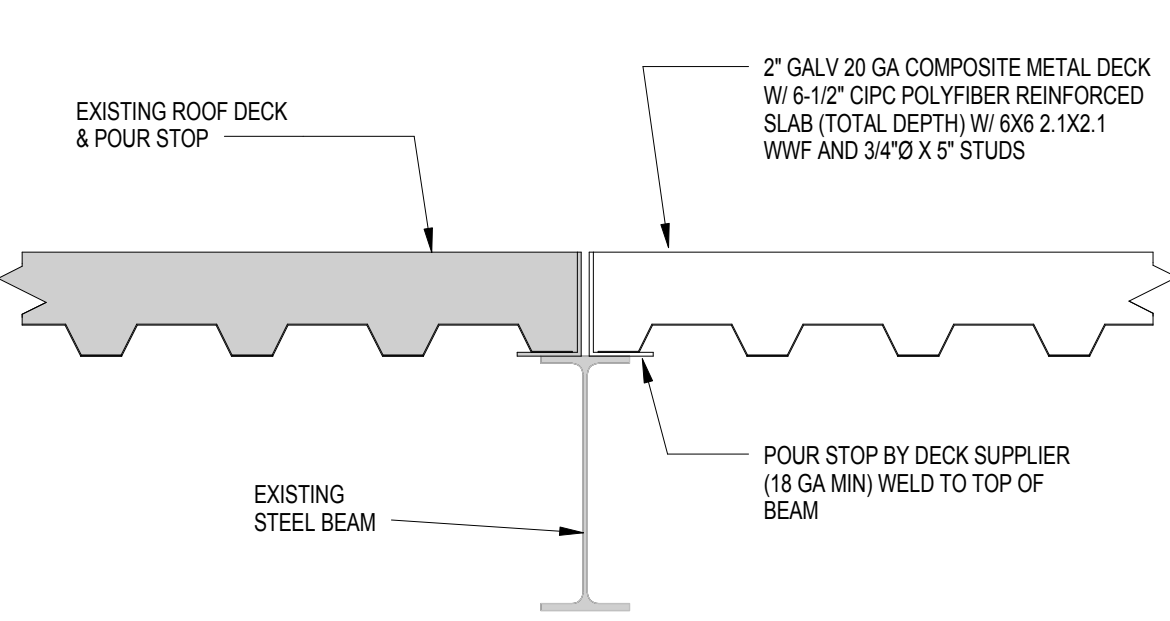
**2F HOUSEKEEPING PAD DETAIL**  
3/4" = 1'-0"



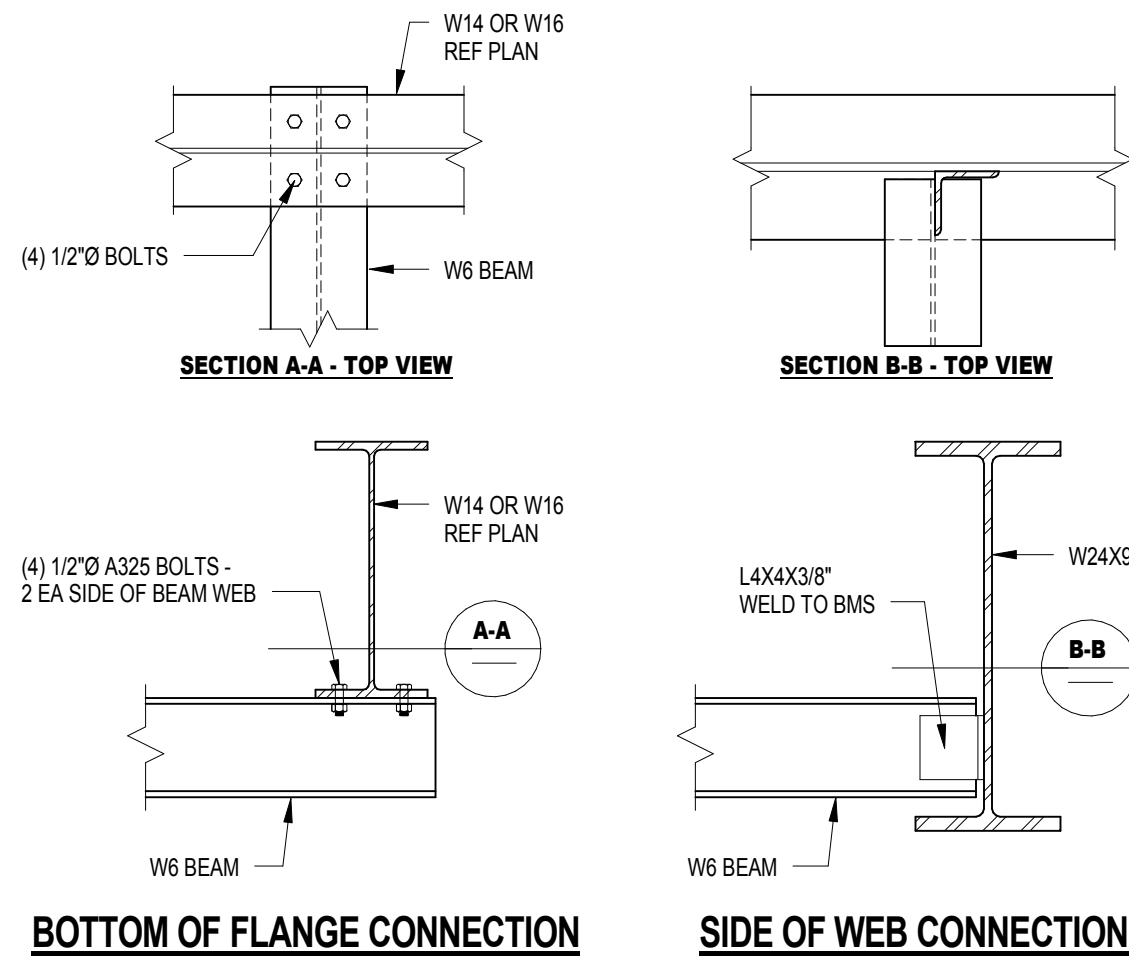
**3C TYP EXT FLOOR EDGE DETAIL @ 0S AND 1S ON GRID '1'**  
3/4" = 1'-0"



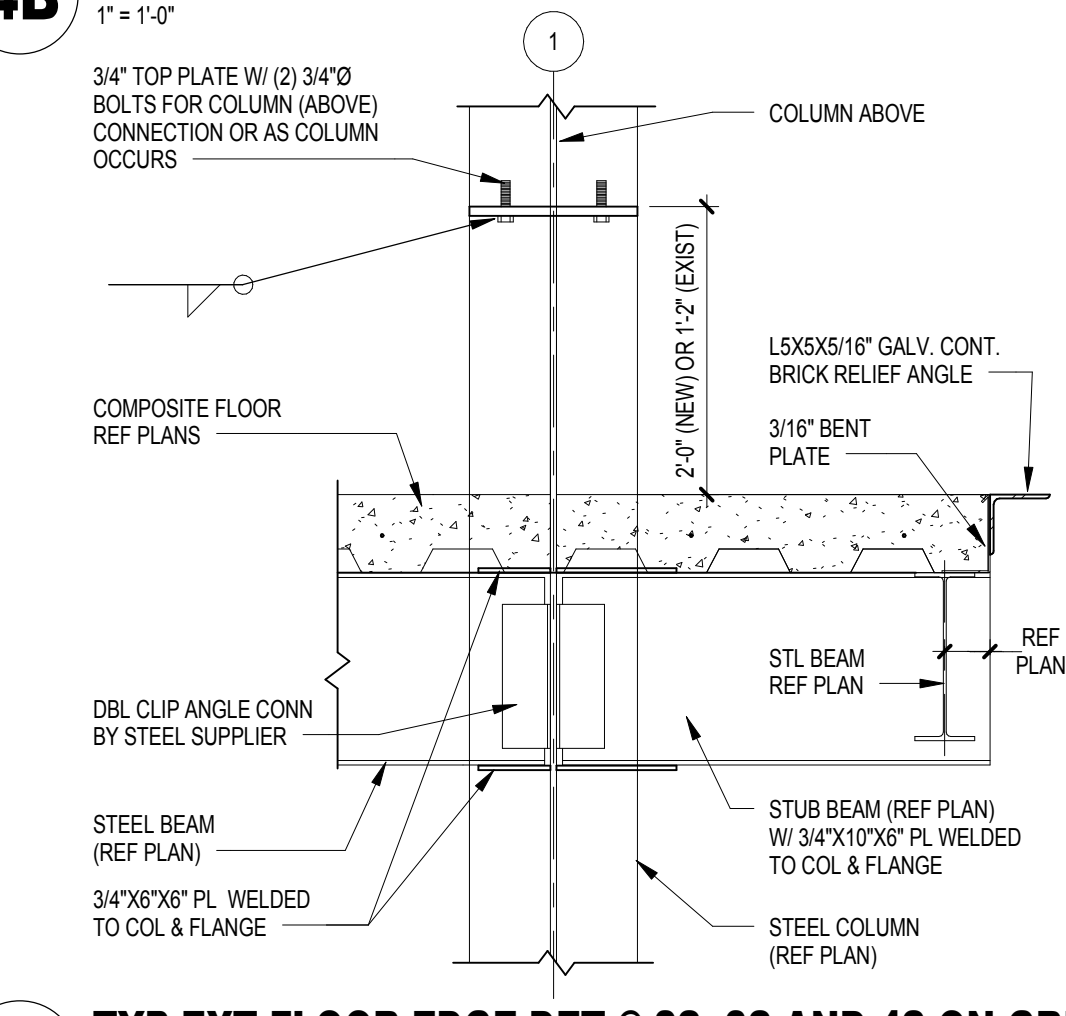
**3E BEAM/BEAM CONNECTION**  
3/4" = 1'-0"



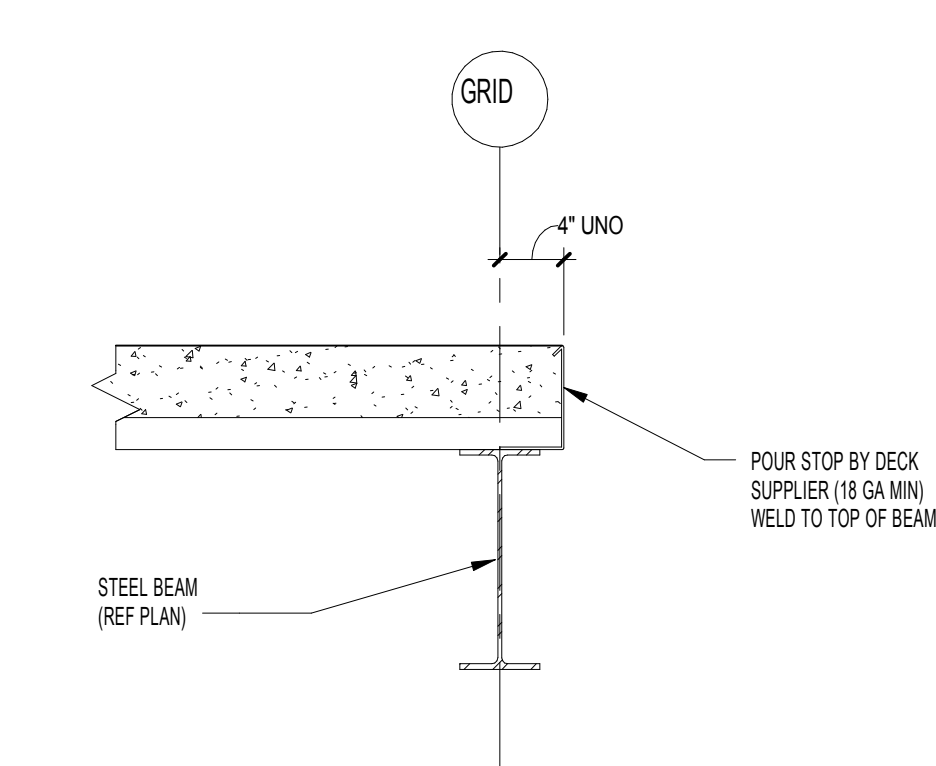
**3F EXIST/NEW DECK SUPPORT DETAIL**  
1" = 1'-0"



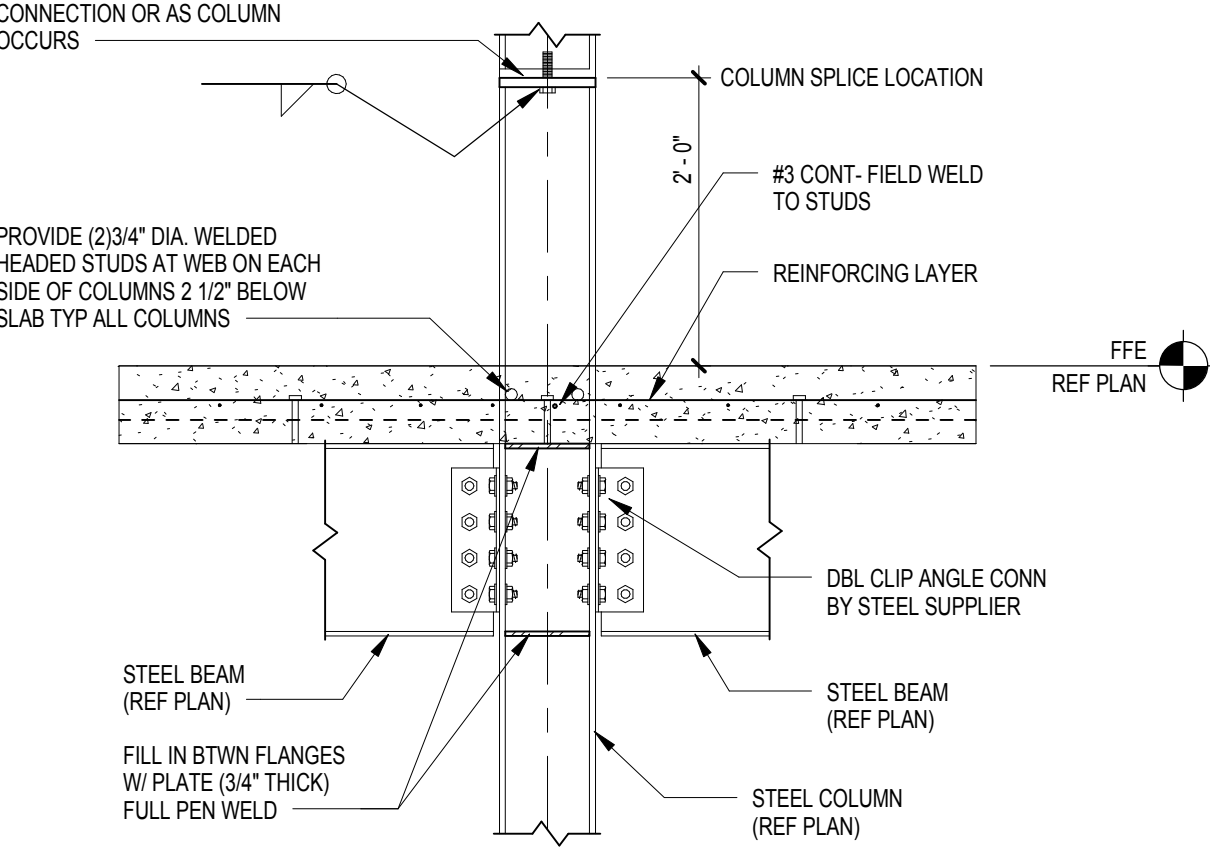
**4B PATIENT LIFT SUPPORT FRAMING CONNECTIONS**  
1" = 1'-0"



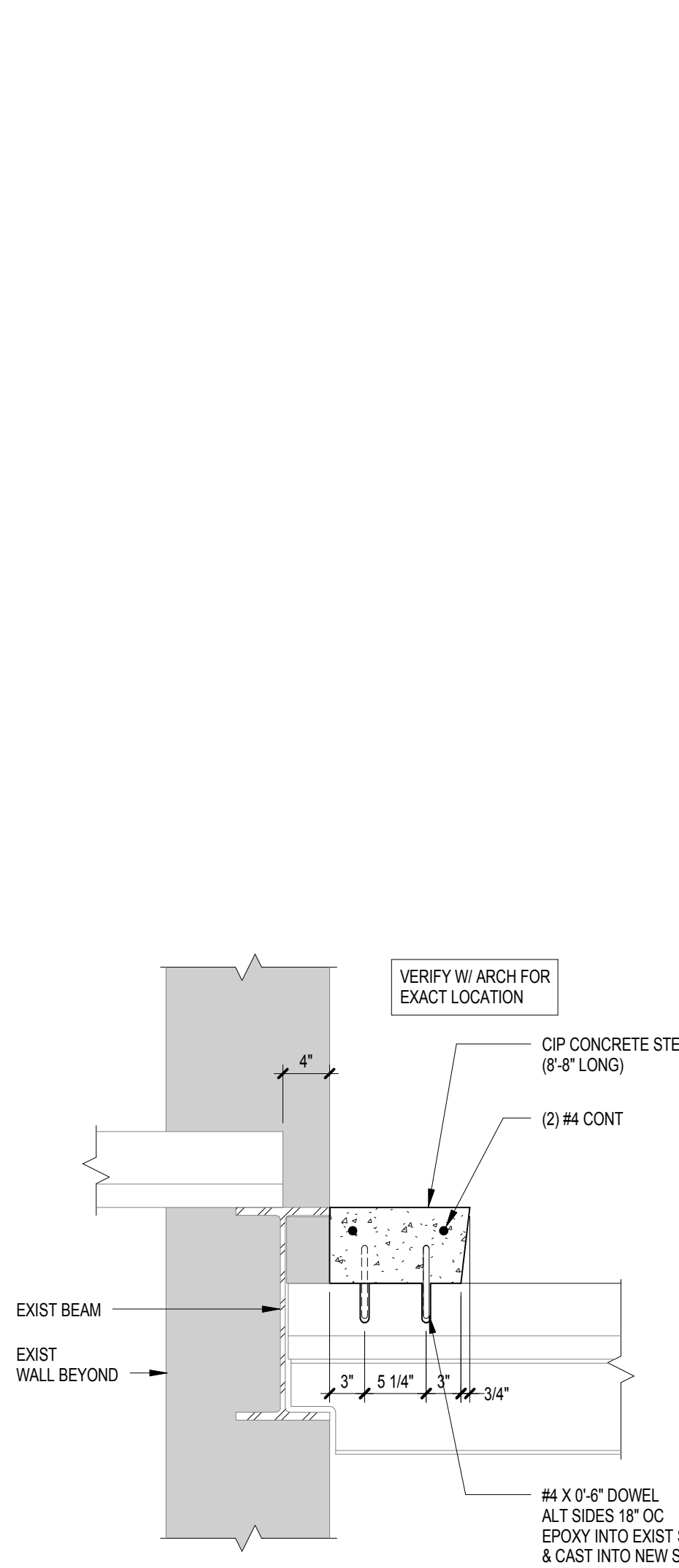
**4C TYP EXT FLOOR EDGE DET @ 2S, 3S AND 4S ON GRID '1'**  
3/4" = 1'-0"



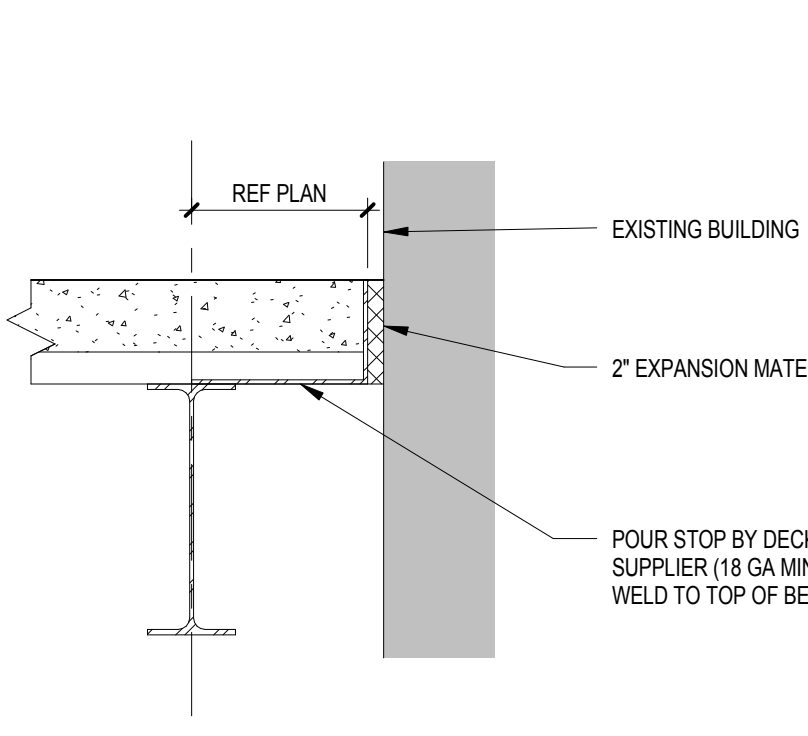
**4E SLAB OPENING DETAIL**  
1" = 1'-0"



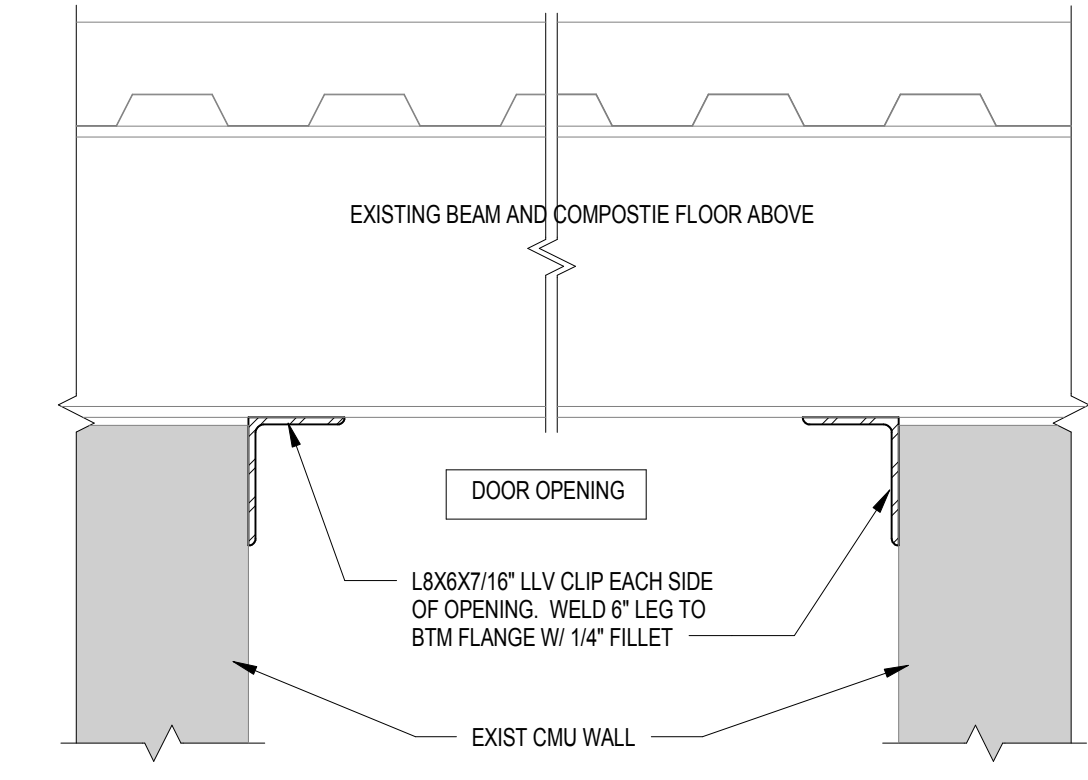
**4F BEAM/COLUMN CONNECTION**  
3/4" = 1'-0"



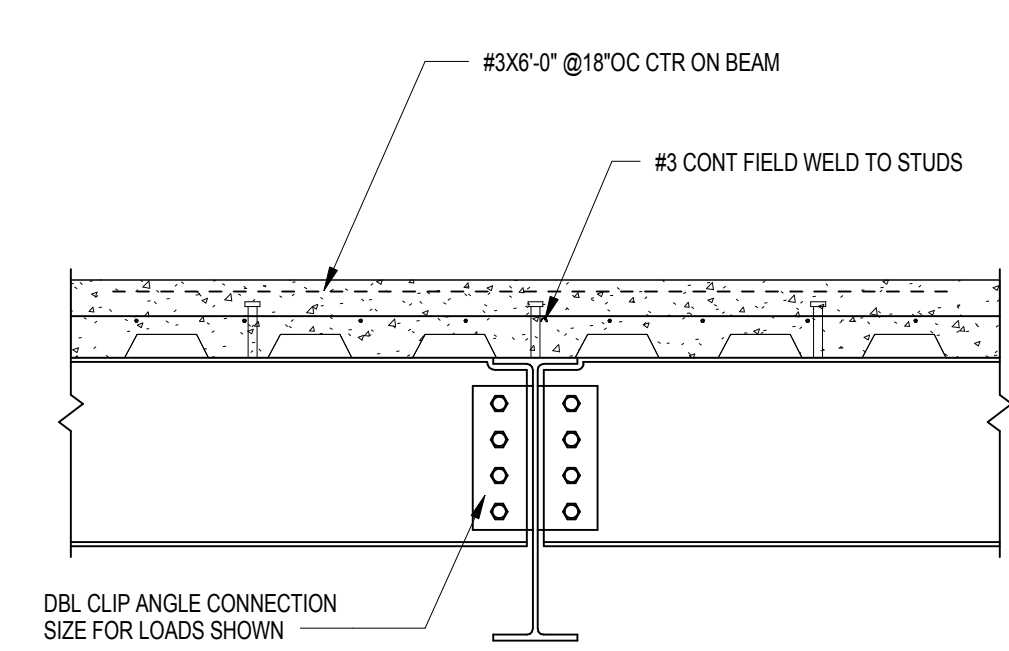
**5C CONC STEP DETAIL**  
1" = 1'-0"



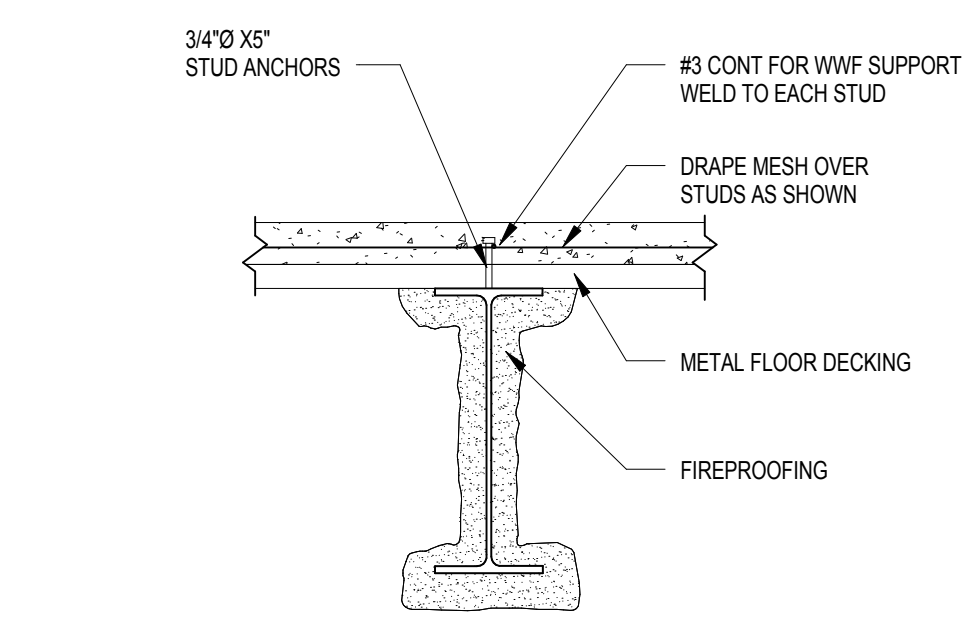
**5E DECK SUPPORT DETAIL @ EXISTING**  
1" = 1'-0"



**6C CLIP AT DOOR OPENING DETAIL**  
1" = 1'-0"



**6E TYP FILLER BM TO COLUMN LINE BEAM CONNECTION**  
3/4" = 1'-0"

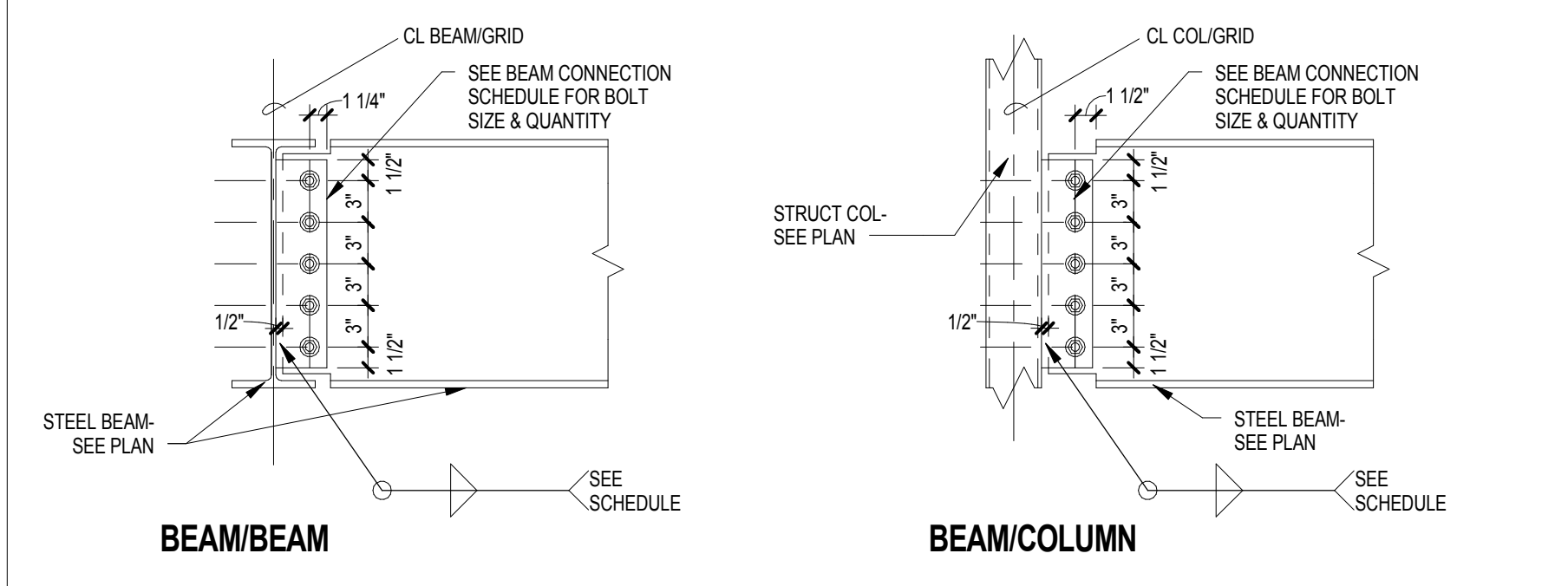


**6F TYP COMPOSITE BEAM**  
3/4" = 1'-0"

**FULLY SPRINKLERED  
100% CONSTRUCTION DOCUMENTS**

<b>CONSULTANTS:</b>		<b>ARCHITECTS/ ENGINEERS:</b>		<b>Drawing Title</b> STRUCTURAL FRAMING DETAILS		<b>Project Title</b> Sioux Falls VA Health Care System Acute Inpatient Medical Unit Addition and Renovation		<b>Project Number</b> 04100857		<b>Office of Construction and Facilities Management</b>	
				<b>Approved: Project Director</b>		<b>Location</b> VA Medical Center 2801 W. 22nd Street, PO Box 5046 Sioux Falls, SD 57117-5046		<b>Building Number</b> 5		<b>Department of Veterans Affairs</b>	
						<b>Date</b> 08/06/12		<b>Checked</b> MEL		<b>Drawn</b> TDB	
								<b>Dwg. 13 of 123</b>			



SINGLE PLATE BEAM CONNECTION SCHEDULE						
BEAM SIZE	CONNECTION CAPACITY		SHEAR TAB SIZE	WELD SIZE "F"	NO. OF 3/4"Ø A325-N BOLTS	REMARKS
	ASD	LRFD				
W8 W10	-----	-----	PL 1/4"x4-1/2"x0-6"	3/16"	2	W8: 11 kips w/ COPED FLANGE
W12 W14	-----	-----	PL 1/4"x4-1/2"x0-9"	3/16"	3	---
W16 W18	-----	-----	PL 1/4"x4-1/2"x1-0"	3/16"	4	---
W20 W21	-----	-----	PL 1/4"x4-1/2"x1-3"	3/16"	5	---
W24 W27	-----	-----	PL 5/16"x4-1/2"x1-6"	1/4"	6	---
W30 W33	-----	-----	PL 5/16"x4-1/2"x1-9"	1/4"	7	---
W36 W39	-----	-----	PL 3/8"x4-1/2"x2-0"	5/16"	8	---
W40 W44	-----	-----	PL 7/16"x4-1/2"x2-3"	---	9	---
ADDITIONAL REMARKS:						
1. TYPICAL CONNECTION DESIGN IS FOR A MAXIMUM TOP COPE OF 2" DEEP AND 6" LONG. SHEAR TAB CONNECTION MAY REQUIRE A SMALLER COPE DEPTH. MINIMUM EDGE DISTANCE FOR BOLT HOLES IS 1-1/4".						
2. FOR SHEAR TAB CONNECTIONS WITH SUPPORTING MEMBER WEB THICKNESS GREATER THAN 3/4" USE 3/8" WELD AND 7/16" PLATE.						
3. USE DOUBLE ANGLE BOLTED CONNECTION SCHEDULE FOR REACTIONS EXCEEDING CONNECTION CAPACITY GIVEN IN THIS SCHEDULE.						
						

DOUBLE ANGLE BEAM CONNECTION SCHEDULE						
BEAM SIZE	CONNECTION CAPACITY		ANGLE SIZE	WELD SIZE "F"	NO. OF 3/4"Ø A325-N BOLTS	REMARKS
	ASD	LRFD				
W8 -----	-----	-----	2-L3"x3-1/2"x1/4"x0'-6"	---	2	---
W10 -----	-----	-----	2-L3"x3-1/2"x1/4"x0'-6"	---	2	---
W12 -----	-----	-----	2-L3"x3-1/2"x1/4"x0'-9"	---	3	---
W14 -----	-----	-----	2-L3"x3-1/2"x1/4"x0'-9"	---	3	---
W16 -----	-----	-----	2-L3"x3-1/2"x1/4"x1'-0"	---	4	---
W18 -----	-----	-----	2-L3"x3-1/2"x1/4"x1'-3"	---	5	---
W21 -----	-----	-----	2-L3"x3-1/2"x1/4"x1'-6"	---	6	---
W24 -----	-----	-----	2-L3"x3-1/2"x1/4"x1'-9"	---	7	---
W27 -----	-----	-----	2-L3"x3-1/2"x1/4"x2'-0"	---	8	---
W30 -----	-----	-----	2-L3"x3-1/2"x1/4"x2'-3"	---	9	---
W33 -----	-----	-----	2-L3"x3-1/2"x1/4"x2'-6"	---	10	---
W36 -----	-----	-----	2-L3"x3-1/2"x1/4"x2'-6"	---	10	---

**ADDITIONAL REMARKS:**

1. TYPICAL CONNECTION DESIGN IS FOR A MAXIMUM TOP COPE OF 2" DEEP AND 6" LONG. SHEAR TAB CONNECTION MAY REQUIRE A SMALLER COPE DEPTH. MINIMUM EDGE DISTANCE FOR BOLT HOLES IS 1-1/4".
2. FOR BEAM/BEAM CONNECTION THE NUMBER OF BOLTS IS 3 TIMES THE AMOUNT SHOWN IN THE SCHEDULE ABOVE.

CL BEAM/GRID

SEE BEAM CONNECTION SCHEDULE FOR BOLT SIZE & QUANTITY

1/2"

1 1/2"

STEEL BEAM-SEE PLAN

CL COL/GRID

SEE BEAM CONNECTION SCHEDULE FOR BOLT SIZE & QUANTITY

1 1/2"

STRUCT CL-SEE PLAN

STEEL BEAM-SEE PLAN

SEE SCHEDULE

BEAM/BEAM

BEAM/COLUMN